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THE LONDON MEDICAL GAZETTE,

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SATURDAY, JUNE 6, 1829.

ON THE
STRUCTURE AND PATHOLOGY OF
THE OVARIA, WITH THE TREAT-
MENT OF THEIR DISEASES.

*Being the Substance of the Gulstonian Lectures,
delivered before the College of Physicians,
May 1829.*

BY EDWARD SEYMOUR, M.D.

Physician to St. George's Hospital.

[Continued from page 831.]

LECTURE III.

IF it were difficult to explain the structure, and point out the diseases of the ovaria, that difficulty is greatly increased when we come to the treatment of the latter. The manner in which therapeutic agents produce their effects, varied as it is by the different quantity of strength or sensibility possessed by individuals, is still wrapped in mystery even in this country, which possesses a far more powerful number of remedies, and an experience derived from the fearless employment of them, than any other nation in Europe.

To the diseases of the ovaria generally, and to the particular enlargement or addition to them, consisting in cysts, containing sometimes fluid alone, and at other times secretions of different consistence, several remedies have been proposed, but in general they have been looked upon as nearly beyond the reach of art; and an acknowledged case of ovarian disease is one to which the practitioner is content to observe, and is satisfied if no symptoms except what may arise from inconvenient bulk exist. If, after considering *seriatim* the diseases of this organ, we proceed to seek for remedies to its various affections,

we shall find that we possess very powerful means of subduing disease, and still more effectual ones of calming and alleviating the distress arising from an acknowledged incurable state.

The abundance and employment of therapeutic agents in this country has not escaped the observation, nor failed to excite the wonder of our continental neighbours. In his chapter on English practice of medicine, one of the most celebrated among them, both for liveliness of imagination and extensive learning; and one who, however we may differ from him, may fairly be considered as a man of very superior talents; M. Broussais, after abundance of railery, in which his countrymen so much excel, has not failed to express his belief of the advantage one day to be derived by society from the "frightful boldness," as he terms it, with which calomel, resin, turpentine, colchicum, the æthers, &c. are administered; and there can be no question in the minds of those who have resided several years on the continent of Europe, that the knowledge of the effects produced by the active remedies of our pharmacopœia, particularly those drawn from the mineral kingdom, with few exceptions, is yet in its infancy there.

Without undervaluing the great importance of morbid anatomy, or of minute attention to diagnosis, it may in this place be permitted me to express a hope that those singularly attractive pursuits which seem as it were to lay open before us the whole page of nature, tracing the first change from health to disease, and the termination of disease in disorganization—flattering the sanguine observer sometimes that he has been right in his ideas

throughout all the fluctuating symptoms of the complaint; at other times visiting him with the humiliation of having laid too much stress on particular points, and thus exciting his pride to more close observation—it is to be hoped that such pursuits, universal at present, will not entirely absorb the powers of the mind, and draw it from the investigation of the action of therapeutic substances.

Where would have been the improvement of our profession, as a curative art, if our predecessors had been contented with investigating alone symptoms during life, and connecting them with appearances after death? The most powerful agents—those agents which, when properly employed in disease, can all but confer life; those valuable inductions from the introduction of poisons into the constitution, one of which has stamped immortal honour on the art of medicine in this country—would have been lost; and the science reduced to the sad condition of conveying to the observer only a better and more accurate knowledge of the nature and fatality of disease—only a stronger and more mortifying lesson of mortality.

Inflammation of the acute form attacking the ovarium, as has been observed, does not differ in the treatment required from inflammation of the peritoneal coat, and seems best relieved by local depletion, such as cupping on the loins and sacrum, the use of the tepid bath and opiates. It is true the tepid hip bath appears to be inadmissible from drawing a larger quantity of blood to the neighbourhood of the affected part, but this is counterbalanced by the relief experienced from the tension and dragging sensation felt when inflammation attacks a membranous or fibrous structure.

Where abscess in the ovarium adheres to the neighbouring viscera of the rectum or vagina, the care of the physician is required to support the strength during such an evacuation. This indication is to be fulfilled, (and more than one such case is in my remembrance), by bark, light and nourishing diet, and attention to keep the bowels open by means least likely to produce irritation. Here, again, rest, and pure air, are of the most essential service.

In scrofulous disease of the ovaria,

which I apprehend seldom occurs without symptoms of a similar disease in other organs of the body, those remedies which invigorate the health, as pure air, nourishing diet, a mild and equal climate, and alkaline medicines, seem best adapted. In the few cases which I have seen, very acute pain has been always felt in the region of the uterus; acuter pain than perhaps in any other affection of these parts, except in cancerous disease of the cervix or os uteri. The absence of such cancerous disease, which may be easily ascertained, the violence of the pain, the youth of the patient, and the otherwise strumous habit of body, will go far to make us suspect the presence of the disease.

The best local remedy, at least that which produces most comfort, is the internal use of injections, with the extract of *colchicum*. The extract of *colchicum*, given in the dose of a grain, two or three times daily, has likewise appeared to be attended with the most soothing effect. The patient, in more than one instance, has expressed herself relieved by this remedy in a manner quite extraordinary. I leave it to the more extensive opportunities of those who hear me to determine the accuracy of the observation.

In the true schirrus of the ovary I am unable to propose any remedy on which any confidence can be relied; and this remark will apply to all those diseases of the organ which have been designated by the name malignant. In the absence of a certain knowledge of the cause or progress of such diseases, various remedies have been had recourse to, supposed either to control the growth, or exercise a power over the absorbent system sufficient to cause the disease to disappear; and to every one of the remedies which I am about to consider this power has been believed to belong. Mercury, iodine, the caustic alkali, and the muriate of lime, have each been believed to cause the removal of these morbid growths; but to be more effectual in recent cases, where the tumors are soft and spongy in their texture, than in those of a solid or fibrous character.

Mercury is now well understood to be most useful when applied in inflammation likely to terminate speedily by the effusion of lymph; as in inflammation of the trachea, of the iris, or of serous membranes. It would be quite needless for me to detain the College

by entering minutely into the illustrations of the cure of these diseases by mercury. The masterly and vigorous descriptions of my friend Dr. P. M. Latham of the action of this remedy, when lecturing on rheumatic pericarditis, must be fresh in the recollection of all who hear me; and it is probable that its beneficial effect in these cases consists principally in its alteration of vascular action; after which any matter recently effused is taken up by the natural power of the absorbents, a power often most remarkable in large abscesses, which subside without bursting or being discharged by art. Where lymph has already been effused in considerable quantity, we have no reason to believe that mercury is beneficial in causing its absorption; as we find in inflammation of the pericardium, where its influence is powerful only when employed early and fully, putting a stop to the effusion going on, but almost useless when that effusion has already taken place.

If these principles be true, mercury is best applied to those cases in which vascular excitement has immediately preceded the enlargement, and still continues; in which case its growth may be entirely stopped, and the absorbent system resume its healthy action, to diminish the increase of bulk already formed.

There is no question but that there are some constitutions which bear marvellously ill the introduction of mercury into the system; and, although such cases are probably much more rare than persons unconnected with the profession would be induced to believe, they excite a well-founded fear of having recourse largely to an agent which may possibly so materially aggravate the patient's distress. When administered, therefore, it should be at first in small quantities, and carefully watched; inunction seeming the form in which it can be introduced with least detriment, and in which the friction employed may contribute to its rapid absorption.

It is fair, however, to say that the use of this medicine, in encysted tumors and ovarian dropsy, is condemned by a physician perhaps of as extensive experience in such complaints as any now living—Dr. James Hamilton, of Edinburgh; who states, that, after having seen it employed in many hundred cases, he cannot call to mind one in which benefit was the result.

Its indiscriminate use cannot be con-

demned by any one more than myself; but, on the principle I have quoted, it appears to me it may be used beneficially where blood-letting is necessary, and I shall have to advert to such cases. It is not easy to see why its important influence should be excluded from the inflammatory progress of disease in this organ more than any other in the body.

It is only within the last twelve years that iodine has been introduced into practice as a deobstruent; and previous to the general recommendation of it, by Mr. Coindet, of Geneva, in bronchocele, it occurred to me to witness somewhat extensively his employment of it, during my residence in that city, in 1819. The tincture was the medicine generally employed, and ten drops given twice in the day, gradually increased to twenty: this form being afterwards in a great measure relinquished for the more convenient one of inunction with the salts formed by a union of the hydriodic acid with the fixed alkalis. The extraordinary diminution in the size of bronchocele, the endemic disease of Switzerland, under the use of this remedy, induced a very general and rash employment of it; and several instances occurred in which death appeared to have been hastened by its use, and health ruined under its exhibition.

Some time often elapsed, after its discontinuance, before decided proof of its powerful effects occurred. The bronchocele was, indeed, often diminished, and in some cases disappeared, but the patient suddenly became reduced in strength, the nervous system greatly disturbed, sensation being diminished, especially the sense of touch; and in extreme cases (and one is very forcibly impressed on my memory), the whole appearance of the patients was that of a man labouring under paralysis agitans.

At other times, profuse perspirations, with extreme sensation of debility, accompanied with griping pains in the stomach and bowels, were the symptoms which followed its imprudent employment.

These evil effects manifestly arose from the abuse of the remedy, and would be applicable to any of those powerful medicines with which physicians in this country combat the severest forms of disease.

Arsenic, copper, mercury, colchi-

cum, and many others, must be included in the severe decree which would prohibit the use of powerful remedies, from their possible or even probable misapplication.

It is certain that bronchocele has been greatly diminished under the use of this medicine; it is likewise certain that the soft cases of the disease, even when very large, have disappeared altogether under its use, and without any injury to the fortunate patients. It is an easy step to apply it from the diseases of the thyroid gland to encysted ones of the ovarium, and, accordingly, it has been used and recommended for the purpose of causing the absorption of these tumors. It is an active stimulant, and appears to me only applicable to those forms of ovarian disease not accompanied by excitement. In fact, the very reverse of mercury; and in two cases which have fallen to my observation, which have recovered, it appears to me to have succeeded by causing inflammation and subsequent suppuration in the tumor.

The following case will best explain the progress of the symptoms, and their result during its employment.

C. T., æt. 31, was admitted into the Asylum for Recovery of Health, under the care of my colleague, Dr. Badeley, in March 1827, at the recommendation of a very experienced physician, who considered her labouring under ovarian disease. A large tumor, which could be traced into the pelvis, occupied the whole left side of the abdomen, and stretched over beyond the umbilicus; it was hard to the touch, irregular, and gave a sense of obscure fluctuation when struck with the hand. It had existed a year and a half. The health was tolerably good, and the only pain experienced was from the unwieldy bulk and weight of the tumor. The patient was put, by Dr. Badeley, under the use of the iodine, and, after continuing it for two months, without any very marked effect, came under my care, in consequence of Dr. Badeley's severe indisposition. She was then taking twenty drops of the tincture twice daily, and rubbed in half a drachm of the ung. hydriod. potass morning and evening. The last was increased to double the quantity; and with the occasional application of leeches and the mildest laxatives, this treatment was continued for three months. The tumor appeared to grow gradually

softer, and at length very violent constitutional symptoms arose; tremblings, great distress of mind, and lowness of spirits; to which succeeded the symptoms of internal suppuration: a very quick pulse, tongue brown and dry, rigors, followed by profuse sweats. At the expiration of a fortnight the patient began to pass purulent matter by the rectum and by the vagina, of various consistence and intolerable factor: this passed daily for several weeks. She was now allowed generous diet and bark, and sent into the country, and at the expiration of five weeks she returned with her strength restored, and the tumor entirely had disappeared.

Six months after this, she consulted one of the most eminent physicians in London, who has made uterine diseases his principal study; and on the minutest examination, no tumor could be discovered; nothing but the doubling over of the integuments of the abdomen, which, from long distention, had lost the power of regaining their natural contractility.

The third of the remedies which have enjoyed a high reputation as a deobstruent is liquor-potassæ. This medicine, employed in as large doses as the stomach will bear, appears to have been successful in discussing indolent scrofulous tumors, and those of a steatomatous kind. It is with diffidence that I offer any result of my own experience; but in diseases of a malignant nature, affecting internal parts, it has appeared to me to produce more alleviation than any other remedy with which I am acquainted. This applies, however, principally to those tumors when they are not attended with acute pain, or any considerable symptomatic fever.

Liquor-potassæ has been recommended in ovarian disease of the kind we are considering, and the general health appears often to have been greatly improved during its use; and the formidable disease itself is reported to have disappeared under its employment.

The liquor-potassæ, in such cases, appears to act by inducing suppuration in the cysts, which is afterwards discharged after adhesions formed with neighbouring viscera. In this respect its action resembles that of iodine, and is contraindicated when increased vascular action is present; hence it would appear to be most useful in those cases to which mercury is inapplicable, and, in fact, it is in the leucophlegmatic habit of

body that it appears to be most beneficial, whether as a curative or only as a palliative agent.

Dr. Warren has favoured me with the account of a case which occurred under his care several years ago, in which this remedy was employed in very large doses, as large as the stomach could bear it, at short intervals. After some weeks, softening of the tumor took place, adhesion with the great intestine, an opening was formed, and much purulent matter, united with other secretions of various consistence, such as are observed in these tumors passed by stool. The swelling subsided, and the patient entirely recovered her health.

It may fairly be objected, that a similar result would have taken place in both these cases without the employment of the remedy, as we know it occasionally does. It can only be answered to such an allegation, that medicines of such strength could scarcely be administered without effect, and that presumptive evidence is in favour of their having been agents in the process.

It must be left to the experience of future observers whether such is the fact; and should it be established that the immediate action of these remedies is the softening and assimilation of the various contents of these tumors previous to their being discharged, the discharge depending on circumstances which regulate the evacuation of abscesses under ordinary circumstances, one step will undoubtedly be gained both in the knowledge of the *modus operandi* of these medicines, and also of the process preparatory to the cure of the disease.

From the use of the conium, once so famous as a deobstruent, no advantage except the relief of pain appears to be obtained; and the repeated application of blisters, equally unavailing for the principal object, has not even the advantage of relieving pain.

It is not intended to assert that circumstances may not render the applications of blisters necessary, but as deobstruents they appear worse than useless.

The muriate of lime was some years ago brought forward, with strong recommendations in its favour, for the cure of scrofula; at least its internal use was believed to have contributed greatly to the healing of scrofulous sores and the discussion of scrofulous

swellings. Whether the extravagant encomiums passed upon it by its first champions produced the natural consequence of lessening in a short time its real value, it would be difficult to decide: certain it is that it has not of late years, in this country, been very highly esteemed by physicians. Still, if we believe the testimony of various physicians in different countries, we should be induced to feel that, although it does not deserve the original extraordinary encomiums, it still less merits unusual depreciation. Very good and varied testimony in Switzerland has assured me that marked good effects were observed from its use in strumous swellings, to which the country people in close and mountainous districts are very subject. As a matter of ordinary experience, it was asserted that sores healed and tumors subsided under its use in a greater degree than any other medicine, or course of medicine, which could be mentioned:

As far as my personal observation goes, which is of course very limited, it is inferior to the liquor-potassæ in the diseases in which it has been recommended.

It has received, from Dr. James Hamilton, of Edinburgh, the greatest possible reputation in the cure of encysted dropsy: he conjoined, however, with it percussion of the tumor; and as the testimony of a man of such experience is valuable, and his opinion very decided, I will take the liberty of quoting it.

“Adverting to the effects of percussion and of pressure in chronic rheumatism, and knowing the influence of the continued use of the muriate of lime in indolent glandular swellings, the author was led to the trial of those several means as being at any rate perfectly safe. He advised, therefore, that moderate and equable pressure of the abdomen should be made, by means of a suitable bandage; that the enlarged part should be subjected twice a day to gentle percussion; and that a course of small doses of the muriate of lime should be continued for at least several months. Where pain or tenderness was experienced on the ovary being pressed upon, he recommended, in addition to the above means, the daily use of the warm bath.

This plan of treatment has been much more successful than he had anticipated.

In seven cases in which it was tried, the enlargement has so completely subsided, that it is no longer tangible. There could be no mistake in the majority of these cases, not only because the size of the diseased ovary was very considerable, the fluctuation was distinct, and all the ordinary characteristics well marked, but also because the nature of the affection had been previously ascertained by the most experienced practitioners in London.

In the first three cases, the author considered that there might be some accidental coincidence independent of the remedies employed, and therefore he did not venture to allude to them even in lecturing, being always unwilling to give any hints which might lead to delusive speculations in the practice of physic; but the fortunate issue of four additional cases entitles him to presume that the above means of cure bid fair to prove extensively useful.

Previous to the diminution of bulk in all these cases, it is proper to add, that the circumscribed enlargement of the ovary has invariably become soft."

Long-continued frictions over the tumor have appeared to be followed by the entire disappearance of it, where much fluid was contained in it.

A case of this kind occurred to my friend Dr. C. Clarke, in which the contents of a very large ovarian tumor disappeared under the constant use of frictions. The patient employed a rubber twice daily for several months. The fluid has again very lately appeared, however, to collect.

The powerful efficacy of emetics in discussing tumors—an efficacy well known in swelling of the testis—might lead to the use of this remedy. A very remarkable case occurred to my observation of the power and danger of this remedy where tumors are present, some years ago. A lady at Florence, æt. 60, had a very considerable swelling of the submaxillary glands: feeling incommoded with nausea, she had recourse to an emetic, for the purpose of evacuating what she termed the bile. Three grains of the tart. of antimony were taken for this purpose: after its brisk operation, to her great surprise, the tumor entirely disappeared, and at the same time she complained of double vision. In less than two hours she became comatose, and in the course of that night she died. The immediate

cause of death appeared to be the rapid effusion of fluid into the ventricles.

The effect of sea-sickness in ascites has long been known: there is a remarkable example of its efficacy related by Hoffman from Forestus.

Boerhaave has the following passage in speaking of the use of emetics in ascites, and it is obvious that the evacuation alone could not account for the good effects:—

"Oportet quidam hic monere quod leniora emetica nil agant in ascite, sed fortiora ex brevibus intervallis repetita palmam reliquis præripiant."—Boerhaave in Prat. Med. Art. Hydrops.

[To be continued.]

CLINICAL LECTURE *

ON THE

DISEASES OF THE URETHRA AND BLADDER.

BY CHARLES BELL,

Professor of Surgery to the London University.

GENTLEMEN,

I NEED not use any other argument to induce you to attend to the subject of diseased urethra and bladder than the enumeration of those cases which are now in the hospital. And I have been furnished by one of yourselves with this note, which shews that seven cases of obstructed urine were brought into the hospital within forty-eight hours.

These diseases do not affect merely the dissipated and incautious youth, but persons of all classes of society and of all ages. It has been remarked as singular that a very great many distinguished philosophers and literary characters have died of disease of the bladder, from which the conclusion has been drawn too hastily, that men of sedentary habits are most subject to these complaints; but the truth is, they are very common. You perceive, at all events, how necessary it is that you should be masters of this subject.

The first case which I shall draw your attention to is in its principal circumstances unfortunately too common.

* We have introduced this lecture as a continuation of the subject discussed by Mr. Bell on a former occasion. See Vol. II. p. 809.

Mrs. Rogers, æt. 40, has the bladder so opened by sloughing that you can pass your finger easily into it. This woman was taken in labour, and it was forty-eight hours after the breaking of the membranes before she was delivered. You know that when a labour is protracted in this manner, the occiput of the child's head presses against the anterior part of the vagina, and the neck of the bladder; and when the delivery is accomplished, the parts become inflamed, the discharge suppressed, and by-and-by a slough comes away, which shews that both the vagina and bladder have suffered mortification.

A very great number of cases of sloughing of the vagina and bladder from protracted labour, have been sent into this hospital within these two last years; which you, who are to be general practitioners, would do well to recollect. There is one cause of this occurrence which I may mention as connected with my present subject; it is, permitting the woman to continue in labour with a distended bladder; for an over-distended bladder arrests by sympathy the contractions of the uterus, and therefore delays the child's head in passing through the pelvis. You ought, in such cases of protracted labour, when the child's head has descended, to use the flattened female catheter, and draw off the urine. In regard, however, to the catheter being flattened, I believe that is not necessary; it only serves to remind the practitioner of the particular case in which he has to pass it up, and the unwonted direction in which he has to guide it, between the child's head and the os pubis. But this is not exactly my subject; and I mention this case of Mrs. Rogers because the bladder is open in a manner that may enable us to determine a point of physiology.

The peculiar circumstance here is, that the bladder has been so largely opened that you are permitted to put your finger into the interior of it, and feel it all round. It has been formerly explained to you that the whole interior surface of the urinary bladder is not equally sensible, it is more in analogy with other parts; its sensibility is concentrated to one point. I have often thought of making experiments upon animals to ascertain the sensibility of the bladder, and the fact of its drawing other parts into sympathy. But if we

are diligent, and keep such things in mind, we find there is no lack of opportunity for observation. In the present instance, on introducing the finger into the bladder, and turning the point downwards, so as to press a little below the commencement of the urethra, we find the bladder contracts; the few remaining drops of urine are expelled, and the woman says she has the urgent desire to make water.

This corresponds with what we know to be the case when there is stone in the bladder. The little boy that was operated on for stone, who came from Seven-Oaks, was wont to call to his mother to lift him up by the legs to relieve him from pain, and the constant desire to make water. The relief which he experienced on being turned in this position was no doubt owing to the stone gravitating from the neck of the bladder towards the fundus, and it is a proof that the fundus of the bladder is not so sensible as the neck; at least, it is fair to infer this. You are familiar, also, with the instance of the enlargement of the prostate gland pushing off the stone from the neck of the bladder, and so completely relieving the symptoms of stone as to give rise to the belief that it had been dissolved.

I only mark the fact at present, and beg of you to recollect it. I shall not push the inquiry into all the interesting details which are connected with the sensibility of the bladder, especially as regards the spasmodic affections of the bladder, and those cases of obstructed urine which are so often confounded with stricture of the urethra. We must advance next to a question of a more directly practical kind—the consideration of the patient, G. F., a reduced gentleman, who, in the very last stage of suffering, seeks relief in a public hospital. When receiving the patients on Tuesday, in the waiting-room, this man was carried in beside us on a portable bed. He appeared like one struck with death. In the case-book he is set down as being 28 years of age, but he appeared at that time as if he were 50. His face was pale, his features shrunk, and his pulse weak. On laying down the clothes, a large tumor of the scrotum, in a high state of inflammation, exposed the cause of his suffering. There was no time for delay. I ordered him immediately into bed, and to have a cordial administered. On visiting

him, which I did as soon as I could dispose of the other patients, I found that the bladder had risen to the umbilicus, and that it was round, hard, and prominent, in the belly. Now mark the peculiar features of this case, which point to a distinct line of practice. He has a narrow, callous stricture, an abscess of the scrotum with mortification of the integuments, and extravasation of urine: the bladder is so distended as to have lost all power of contraction: he has the *facies Hippocratica*, a weak, intermitting pulse, and, in short, he is in the very last stage of weakness. Shall we lift this man to the operating table?—shall we commence incisions in the perineum, searching after the stricture, and in the hope of passing a catheter into the bladder?—shall we undertake a tedious and precarious operation, which may not be successful?—or shall we do that which, without inflicting pain, will relieve him at once, and enable us to give him a night of comfort and rest; and which not only will not inflict pain, but will leave him without the source of additional irritation, which the presence of the catheter would create? I resolved upon puncturing the bladder; and this I apprehend to be the proper case for that operation.

When I said that he was a reduced gentleman, I meant more than met the ear—that he was a drunken gentleman, and that he was then in that state of exhaustion (to speak it more conformably to medical language) which comes from being addicted to spirituous potations. When, therefore, I ordered him a large glass of warm brandy and water, I might, without this explanation, have left you under the impression that this was proper practice in other cases.

Some surgeons say that this operation of puncturing the bladder ought not to be performed; or, to express it more emphatically, they say that they do not perform it. Now I hold it to be a matter demonstrated, that there are conditions of the patient when the powers of life have run so low, that any further aggravation of suffering (which an operation by incision certainly is), or any thing that will protract the irritation, will lead to one of two conditions—delirium, or lethargic drowsiness, from effusion on the brain. The operation of puncturing the bladder is done with so little pain that it might

be performed without the patient knowing it; and the relief is immediate. When, in this case, I relieved the distended bladder, passed my lancet freely through the sloughy scrotum, gave the patient his brandy and opium, and laid him to enjoy a sound night's rest, I am confident that I did that which the circumstances of the case prescribed, and which has been attended with a most happy result. I must, however, before I have done, draw your attention to the three other cases in the same ward—of men who have been admitted for retention of urine, and in two of whom the catheter is introduced for abscess in the perineum—to remind you that this is the practice in common; and that the case which requires the bladder to be punctured is very peculiar, and very, very rare.

Let us now attend to the operation of puncturing the bladder. When the bladder is greatly distended, the prostate gland is thrust downwards, so that, on introducing the finger into the anus, you touch it more easily than you can in the natural state of the parts. But, with all this, you have a great difficulty in reaching that part of the bladder where it is said you ought to thrust in your trocar. Authors mean that the trocar should be introduced between the vasa deferentia; but these vessels approach the base of the prostate gland and each other at so acute an angle, and are so near, that you must reach far beyond the prostate before you can touch the triangular space formed between them and the peritoneum. In truth you cannot do it; and my preparations of the punctured bladder show that the trocar has been thrust sometimes on one side, sometimes on another, of the vas deferens; and on one occasion it was thrust through it.

The nearest part of the bladder which you can reach with your finger, is that bulging part which is at the side of the prostate gland: here it was that I pierced it in the case before us. At the point, therefore, where the incision of the bladder in lithotomy terminates, is the best place to thrust in the stilette. You first withdraw the sharp point within the canula, and introduce the forefinger of the left hand into the rectum; you then direct the canula along the finger to the described point, and you thrust forward the stilette. Whilst carrying the instrument onwards into the cavity

of the bladder, you must take care to direct the point in the axis of the pelvis, and thereby you keep in the centre of the distended bladder. After drawing off the water, you should introduce a flexible catheter through the canula; for without this precaution, it is apt to slip out from the bladder, especially when the patient has stools, by the motion bearing against the shield of the instrument.

On the third day after the operation the patient was greatly recovered: he had slept undisturbed at night—he had taken nourishment, and was very grateful for the relief he had obtained. On this day I endeavoured to pass the catheter through the whole length of the urethra, but I could not pass the stricture. Desisting from this attempt, I introduced it from the sloughing opening in the perineum into the bladder, and withdrew the canula from the rectum.

On the fifth day, the bladder having recovered its power, and the passage being free, the catheter was withdrawn altogether.

PETITIONS REGARDING ANATOMY.

To the Editor of the London Medical Gazette.

Worcester, May 20, 1824.

SIR,

I FEEL some degree of reluctance in occupying any portion of your valuable time; but as the impartiality of your Gazette is now placed beyond dispute, I am induced to call your attention to a circumstance, not perhaps in itself of great moment, but in which I feel considerable interest. I observe, from a report of the proceedings of the Westminster Medical Society, published in your periodical, that the honor of having first called the attention of Parliament to the necessity of passing some legal enactment on the subject of dissection, is claimed by that learned body, as stated by the president, Dr. Thomson, at their meeting, April 25, 1829.

Now, as the president of the Worcestershire Medical and Surgical Society, who signed the petition sent by that body to parliament, I beg leave to claim the priority of petition. Un-

doubtedly to the latter society the honor is due of having first called the attention of the legislature to this question; for their petition was presented to the House of Lords by the Marquis of Lansdowne, who made some very appropriate observations on the occasion, on or about the 15th of March, 1828. A similar petition was also sent to Mr. Brougham, by the above Society, by the same post, to be presented to the House of Commons; but some delay was occasioned in its presentation by the absence of that learned gentleman from London, on the circuit.

But the petition of the Westminster Society was, according to a statement contained in the Medical Society, lying on the table of the Society for signatures on the 12th of April, 1828, and was not consequently presented to parliament until after that day.

Whatever benefits, therefore, may arise to the profession from the act that is now passing through parliament, I contend that the members of the Worcestershire Medical and Surgical Society first presented themselves to the legislature, as petitioners, to point out the necessity of some such measure being adopted.

I am, Sir,

Your very obedient servant,

CHARLES HASTINGS, M.D.

P.S.—The special meeting of the Worcestershire Medical and Surgical Society, to draw up the petition, was called as early as Feb. 28, 1828.

NERVOUS SYSTEM.

To the Editor of the London Medical Gazette.

SIR,

A LETTER which recently appeared in your Gazette, signed "Alexander Shaw," and, from the pronoun "*we*" occurring, dictated, it may be presumed, by that relative of the writer whose cause is so warmly advocated, taxes me with misrepresenting, though inadvertently, the opinions and discoveries of Mr. Charles Bell, in consequence of having trusted to the reports of Mr. Mayo's "*Outlines of Physiology.*"

Now, although the whole weight of

the moral turpitude attached to the charge is laid to Mr. Mayo's account, yet I must beg to observe that the experiments, of which my letter was merely the vehicle of a revival, were performed prior to the publication of the "*Outlines*," and for the express purpose of determining whether Mr. Bell or Mr. Mayo was correct upon points on which they appeared to differ so essentially. Such, I find, on referring to my notes, was my object; and my common-place book shows that my impression, upon reading Mr. Bell's publications on the subject, was that he, having experimented upon the nerves of the face, conceived the fifth to be the nerve of sensation and also *mastication*, and consequently a sentient and motor nerve combined; and that the portio dura was, (anatomically and experimentally), proved to be a *non-sentient* nerve, belonging to the class of nerves which he terms "*superadded or respiratory*," governing certain actions not under the control of the will.

The results of my experiments went to disprove the point of the sensibility of the seventh and eighth nerves, it is true, but in the main object they tended to confirm Mr. Mayo's opinions; which were, that the fifth nerve was *purely sentient*, having nothing to do with the motions of the face; and that the portio dura imparted the influence of the will to the facial muscles. Such was my impression of Mr. Bell's and Mr. Mayo's opinions when I published my experiments in 1823. And now, having again referred to *the fountain head*, I cannot, after the most mature consideration, deduce any other interpretation of Mr. Bell's meaning than that which I have expressed.

I am required to correct some inaccuracies which are alleged to have been committed by me in my letter, but which seem to amount only to *two* in number. 1. Ascribing to Mr. Bell the opinion that the fifth nerve is *both voluntary and sentient*. 2. Ascribing to Mr. Bell the opinion that the portio dura is a nerve of *instinctive* motion. This, as far as I can learn, is "the very head and front of my offending," and for which I am blamed because I relied on Mr. Mayo's authority, Mr. Mayo being censured for making such deceptive representations of Mr. Bell's opinions.

I cannot, however, see what inaccuracies and misrepresentations I have to

correct. In 1821 Mr. Bell seems clearly to express the notion that the fifth nerve governed the functions of *voluntary motion and sensation*, from his details of experiments on the horse's and ass's face; and, as to the seventh nerve, although Mr. Bell does not certainly apply the term "*instinctive*" to it, yet is not Mr. Mayo fully justified in thus representing Mr. Bell's opinion? "*In other words*, (says Mr. Mayo), according to Mr. Bell, the seventh is the nerve of instinctive motion to the face, and the fifth of voluntary motion and sensation." Mr. Mayo does not here say, as he is charged, he it observed, that Mr. Bell *calls* it any where the "*instinctive*" nerve. But, does not Mr. Bell's account of the *peculiar* function of the seventh nerve refer it necessarily to the *instinctive* actions? Seeing it in the same light with Mr. Mayo, I adopted the same expression; and I must say that Mr. Shaw's very confused and contradictory account of Mr. Bell's opinions of the portio dura affords me no assistance, but serves to induce a belief that there has been some uncertainty, instability, and variation of opinion upon the function of this nerve, as well as of the fifth; and which seems to me to have arisen partly from that peculiar distribution and juxta position which I lately demonstrated and depicted in your Gazette as existing in the facial nerves of the horse.

When I ventured to renew the subject to which my experiments of 1823, and lately repeated, referred, because they appeared either not to be known or disregarded, I thought thereby to supply the oil that would smooth the ruffled waves; but I find I have unfortunately raised a tempest when I anticipated a calm. Averse to controversy, I trust that, in being induced again to come forward, what I now say will be considered in the true spirit and feeling of the repentant Lady Townley, "not so much my excuse as my confession." I have really no wish to fight the battle of either party, and would rather exclaim with Mercutio, "a plague o' both your houses," being neither a Montague nor a Capulet. Yet, as I have had a lecture read me for relying upon the reports of another, instead of referring to the *fountain head*, I am bound in self-defence to say farther that I was not aware of the fact that the ganglionless fasciculus of the fifth nerve governed

the motions of the lower jaw, thereby associating this fasciculus with the portio dura in function and anatomy, until Mr. Mayo pointed it out*; so that in this respect, also, I cannot consider the reports on this subject in the "*Outlines*" as inaccurate and presumptuous, as we are required to consider them by Mr. Shaw. And, while referring to matters of alleged plagiarism, M. Magendie being accused as well as Mr. Mayo of this offence, it may perhaps assist the cause of the former if I were to state the fact, that on the 2d of September, 1822, M. Magendie informed me, while sitting beside him at a Séance of the Institute in Paris, that he had recently found by experiments, (very difficult to adopt), that the anterior roots of the spinal nerves being divided, the parts supplied by these nerves lost their powers of motion, and retained their sensibility; and that when the posterior roots were divided, the parts supplied by these nerves lost their sensibility, but retained their motion.

As to the question of M. Magendie's originality, and Mr. Bell's priority in the discovery of the separate functions of the spinal columns and nervous roots, I will not venture to give any positive opinion. M. Magendie's communication appeared to me, at the period quoted, to be new as far as it went, although I was aware that Mr. Bell had paved the way to the important facts becoming developed of the separate functions allotted to different portions of the nervous system.

It appears to me that to agitate this question of priority and originality is like quarrelling about a straw. Mr. Bell's and M. Magendie's observations on the subject do not precisely accord; and the palm, perhaps, is equally due to each of these accomplished physiologists, as acute in conception as they are notoriously skilful in execution. Originality of discovery is perhaps rarely confined to one individual. Galen, it appears, entertained notions improved upon by Mr. Bell. An obscure young physician of Turin, Bellingieri, who made the physiology of the facial nerves partly the subject of his inaugural thesis in the year 1818,

glances at the separate functions and properties of nerves.

Thus, one age may be considered as deriving hints from the former, and one individual following the same path as another, each contributes his share to the furtherance of physiological discovery; and it seems to me ungracious and misplaced to contend with jealousy of each other for any claims to originality and priority of invention. He who comes last may complete what his predecessor has begun; correct his errors, perhaps, and supply deficiencies; as the giant sees farther than the dwarf who looks first, and the dwarf on the giant's shoulders farther than the giant himself.

If, therefore, as Mr. Shaw observes, "Mr. Bell has been very little beholden to any of those experimentalists with whom he is classed," the sacred cause of science at least has gained; but such advantage is not to be procured by such comments as Mr. Shaw has indulged in, but rather, I presume, by means of that course which he appears to sneer at and condemn; that is, by frequent investigation and repetition of experiment, from which we may confidently expect, not the confusion of the subject to which these are applied, but rather its elucidation and improvement, especially when theorists conceive first, and then try experiments to establish their conceptions, instead of making experimental facts the basis of their reasoning.

In conclusion, I have now only to observe, that I do not regard Mr. Shaw's letter as having at all advanced the cause of his relative and teacher, whose merits, I trust, rest on more creditable and firmer ground; and whom posterity, as well as his cotemporaries, must ever consider with a due appreciation of his character as an eminent physiologist, of great penetration, ingenuity, and experience, whatever doubts may be entertained of the intrinsic value of some of the speculative doctrines which he has sought to establish from his opinions and discoveries upon the nervous system; and of which, perhaps, future ages will judge better than the present.

I have the honour to be, Sir,
Your obedient and humble servant,
S. D. BROUGHTON.

* Vide Anatomical and Physiological Commentaries, Part II. page 10.

MR. SHAW IN REPLY TO MR. MAYO.

To the Editor of the London Medical Gazette.

SIR,

THE letter which I addressed to you in the Gazette of May 23, has been followed by one from Mr. Mayo, in which he undertakes to answer the statements contained in my letter—with what success, I will presently inquire; but I must first observe, that he enters upon the task with an air of condescension which, I may be allowed to say, is quite misplaced. He announces that I am a young man—this is a matter of little moment as far as regards the statements I made (which are all accompanied with references to publications and to dates), and the answers which he must give to them. But it appears that by representing me as young, he takes to himself the privileges of age, and he thinks that these ought to have preserved him from the animadversions which I have made. I believe I am not altogether destitute of that ancient virtue which enforces respect and deference to the aged; but let me ask what was the example afforded me by Mr. Mayo himself when *he* was a young man, commencing his professional career—eight years ago? What was his conduct towards Mr. Bell, his senior by many years—his teacher, and in whose house he had resided? It is entertaining to hear Mr. Mayo, of all men, assuming the tone he does—he who commenced by opposing in the most reckless manner all that Mr. Bell had done on the subject of the nerves, and who afterwards claimed as his own the most essential and prominent parts of his preceptor's discoveries. He was protected from Mr. Bell's animadversions merely because he was a very young man, and had been his house pupil. Now when I, also a young man, and a pupil, presume to expose the inaccuracies of *his* work, he doffs the character of the youthful physiologist, and demands from me the respect due to one advanced in life. With an alacrity quite unbecoming his last character, he leaps from one defence to the other:—how then am I to assail him?

I grant to Mr. Mayo that the remarks which I made in my former letter were severe—I will even allow that their tendency was such, that if they could be

proved to be in the smallest degree unsupported by facts, I deserved all the imputations which he has cast upon me. But I allege that there is not one of my statements which he has shown to be incorrect. Instead of answering, as he ought to have done, the separate charges which I made, he has merely reiterated some of the assertions of which I required an explanation, and has omitted even to allude to the most serious of the charges. All the extracts which he has supplied from Mr. Bell's papers, from M. Magendie's, and from his own, exclusively relate to the nerves of the mouth. Will any thing he can say about them justify the numerous liberties he has taken with Mr. Bell's opinions in more important parts of the subject? For example—

1. Mr. Mayo has asserted that Mr. Bell called the fifth pair the nerve of sensation and voluntary motion to the face: Mr. Bell's words are, that it is the nerve of "mastication and sensation;" whilst he showed that the motions of the face were governed by the portio dura.

2. Mr. Mayo persists in saying that Mr. Bell considered the frontal branch of the fifth a nerve of voluntary motion and sensation; the fact being, that Mr. Bell is the only one who has made experiments to prove *that it is not* a nerve of motion at all, but simply a nerve of sensation. Since I cannot prevail on Mr. Mayo to look to Mr. Bell's original paper, let him refer to the first number of his own "Commentaries," and he will find there (p. 118) an extract from Mr. Bell's paper, which contains the proofs, and the only ones that have ever been brought forward, that this frontal branch is not a nerve of motion.

3. Mr. Mayo declares that it was he who discovered that a part of the fifth pair was for bestowing motion. He has no claim whatever to this discovery. For reasons best known to himself, he has omitted to mention the only experiments which prove this to be a nerve of motion. These experiments were made by Mr. J. Shaw, and the account of them was published in two separate papers, before Mr. Mayo announced it as a discovery of his own.

4. Mr. Mayo persists in representing Mr. Bell as calling the portio dura of the seventh pair the nerve of *instinct*;

whereas this is a term which was never once used by Mr. Bell.

5. Mr. Mayo is of opinion that the *portio dura* "is simply a nerve of voluntary motion." We ask for some proofs that this is really the case, before we can prefer his opinion to that of Mr. Bell.

6. Mr. Mayo is bound to explain, in the most ample and satisfactory manner, why he declared that Mr. Bell said each of the two roots of the spinal nerves was possessed of two functions; statements contrary to every sentence in Mr. Bell's works, and entirely without foundation.

7. We have a right to demand from Mr. Mayo some valid reasons for his preferring the experiments of M. Magendie on the spinal nerves to those of Mr. Bell; since it is clear that he rejected Mr. Bell's for defects which are not to be found in them, but are acknowledged to exist in those of the French physiologist.

8. An explanation is required why Mr. Mayo asserted that the only correct inference in Mr. Bell's first paper regarded the infraorbital branch of the fifth: since this is the only nerve concerning which some imperfection has been shewn to exist.

9. It is incumbent on Mr. Mayo to inform us more particularly who was Dr. Blair, to whom he attached the credit of having discovered all that was valuable in Mr. Bell's first paper. We fear that respectable gentleman has been quite lost sight of, in the midst of all those discussions on the nerves which have followed Mr. Bell's paper.

Lastly, Let me propose to Mr. Mayo a question not put down distinctly in my former letter: why did he omit altogether to mention the name of Mr. Bell, when he wrote his second paper on the subject of the nerves, in the second number of his "*Commentaries*?" Every sentence in that paper required a reference to the investigations of his former teacher. It treated of the functions of the *portio dura*, of the fifth pair, of the spinal nerves, and of the resemblance between the fifth pair and these spinal nerves; yet he has carefully omitted Mr. Bell's name. The statements he made about the fifth, required the confirmation of Mr. John Shaw's experiments, to save them from being abso-

lute nonsense. Yet, although these were before the public, Mr. Mayo abstained from referring to them. The only names in his paper are, Flourens, Magendie, and—Mayo.

Instead of replying to the above questions, relating to so many different points, Mr. Mayo has confined himself to giving extracts; and these apply only to the nerves of the mouth. I willingly take him on the ground which he himself has selected as the strongest; and I can prove that he has neither justified himself for misrepresenting Mr. Bell's expressions, nor established his right to any of the discoveries he claims.

He persists in saying that Mr. Bell considered the facial branches of the fifth as nerves bestowing voluntary motion to the face. Mr. Bell never even hinted such a thing: he stated distinctly, that the branches of the fifth which possessed any influence over the muscles, were bestowed to those parts only which are engaged in mastication. The frontal branch, which is one of those facial branches of the fifth, was proved by Mr. Bell, by direct experiments, to be in no respect a motor nerve.

But let me confine myself to the infraorbital nerve, one of those supplying the mouth. This nerve distributes its branches to the muscles of the nostrils, and likewise to the muscles moving the lips. Now, it must be allowed by Mr. Mayo that the nostrils are placed under the command of volition; thus we can sneer, to show contempt, when occasion calls for it! Let us determine, then, whether Mr. Bell ever said that the nostrils obtained voluntary motion through this nerve; and I refer my readers to his original paper. In the experiments related there, it is shown most clearly that it was only the lips, during feeding or masticating, that were conceived by Mr. Bell to suffer any loss of motion by the division of the infraorbital nerve: that "no change took place in the movements of the nostrils" is pointedly and distinctly set down by Mr. Bell. How can Mr. Mayo justify himself for thus perversely saying that Mr. Bell was of opinion that the facial branches of the fifth were the nerves of voluntary motion to the face?

But as to this infraorbital nerve, Mr. Mayo has renounced all claims to speak of it, and the same be said of the

portia dura. It was after M. Magendie had distinctly shown that Mr. Bell was inaccurate in assigning any degree of motion to the infraorbital nerve, that Mr. Mayo came forward and asserted that the only correct part of Mr. Bell's original paper was to be found in his account of this nerve! but, he added, Mr. Bell borrowed his knowledge of it from a Dr. Blair. This Dr. Blair, he says, showed, in the beginning of the eighteenth century, that the infraorbital nerve was merely a nerve of touch. After admitting this, what was the use of Mr. Mayo making additional experiments on the portio dura? Mr. Bell cut the portio dura, to show how different it was from the fifth. Mr. Mayo cut the same nerve on both sides at once:—this is granted, and has been acknowledged many years ago. But now for “*the honour of discovery*” which Mr. Mayo claims in regard to the influence of the portio dura upon the mouth—to what does it amount? If Dr. Blair proved that the infraorbital nerve was a nerve of touch, what was left for Mr. Mayo to discover? If the fifth did not produce the motions of the lips, it was perfectly obvious that the portio dura must! In attempting, therefore, to give the observation of Mr. Bell to Dr. Blair, he has done more than he intended, for he forgot that he was proving his own experiments to be useless.

In discussing a subject of this kind, when we enter upon minute particulars, there is apt to be an appearance of intricacy; and this may perhaps lead a person imperfectly informed to suppose that there are fair grounds for controversy. I have been desirous of arguing the subject with Mr. Mayo upon that part which he has selected as his strong hold; and it is for this reason I have gone into those minute details concerning the nerves of the mouth. But the answers to the questions which I put in my former letter, and have repeated in this, require to be altogether simple and direct—there is no excuse for making them complex: they all tend to this alone—has Mr. Mayo used Mr. Bell's words or expressions in representing his opinions?—has he given a fair statement of facts?

Before I conclude, let me remark, that I am far from presuming to determine whether Mr. Mayo's conduct to

his senior, and to his master, has been correct in this matter, or such as authorized the tone which he has assumed towards me. I did not commence this inquiry, nor do I desire to continue it. I only declare that, as a sense of justice forced me to repel the pretensions of Mr. Mayo, set forth in his letter of May 16th, so am I at all times ready to oppose any claims that he shall make, until I find something which is not contained in Mr. Bell's previous publications. I have the honour to be,

Your obedient servant,

ALEXANDER SHAW.

Torrington-Street, Russel-Square,
May 30th, 1829.

ANALYSES OF BRITISH MEDICAL JOURNALS.

MIDLAND MEDICAL AND SURGICAL
REPORTER.

No. IV. May 1829.

[Concluded from p. 314.]

ART. VII. *Of the Otorrhœa Purulenta, or Chronic Puriform Discharge from the Ear.* By JOHN BURNE, M.D.

OTORRHŒA is a chronic discharge from the ear, and may proceed from the organ itself, or from suppuration in some neighbouring part. The discharge may consist of mucus or of pus: the purulent discharge is not unfrequently preceded by the mucous, and both are the consequence of inflammation. The mucous otorrhœa is met with in children particularly, and is seldom of serious consequence; it generally yields to treatment, or subsides at the age of puberty. The purulent otorrhœa, on the contrary, is deep-seated and dangerous; and it is this which forms the subject of the following observations.

It is inflammation of the mucous lining of the tympanum which generally gives rise to purulent otorrhœa; and the construction of the part opposes the discharge of the matter, the simple retention of which is the cause of serious mischief.

Inflammation of the tympanum manifests itself by severe pain deep in the ear, which rapidly increases, and affects the whole side of the head. The pain extends in the direction of the eusta-

chian tube, and of the mastoid cells, and is aggravated by the slightest noise or motion. The cavity of the tympanum is soon filled with a muco-purulent secretion, which having no outlet (the eustachian tube being obstructed by tumefaction) produces a most distressing sense of tension. To these symptoms, delirium not unfrequently succeeds, and all the sufferings continue until the matter has worked itself an outlet.

This it may do through the membrana tympani, or by the eustachian tube, or through a fistulous opening in the mastoid process. Of these, the first exit is by far the most common. After several days of extreme suffering, the perforation of the membrana tympani is effected; and a copious discharge of matter takes place, which is immediately succeeded by a subsidence of the symptoms. In some instances, the matter is said to discharge itself by the eustachian tube, but, from Dr. B.'s experience, this does not take place until the inflammation has been relieved by the spontaneous perforation of the membrana tympani. In this case, the discharge will continue both by the meatus externus and the eustachian tube, simultaneously.

The purulent otorrhœa does not always begin in such an acute form as that above described. It is often produced by inflammation travelling from the throat along the eustachian tube to the tympanum, which happens particularly in eruptive diseases, and hence the date of the otorrhœa is frequently referred to the period when the patient had the small-pox or scarlet fever.

When the matter has found its way through it into the mastoid cells, it cannot be evacuated, except through a carious perforation. From the form and situation of the tympanum, the matter lodges in it, as in a well, and gives rise to a train of formidable symptoms, which constitute the second stage of the disease.

The continual lodgment of matter from the cause above detailed, now begins to operate injuriously on the containing parts. The perforation of the membrana tympani giving access to the air, the retained matter is decomposed, and its irritating qualities increased, by which the lining membrane is exulcerated, and the bone exposed.

The parts which first suffer are the mastoid cells, in which the matter is pent up: the slow advance of the caries is indicated only by obscure signs, so that the bony structure of the ear is undermined before we are aware. For a considerable period there is little else complained of than an obscure pain, and the sense of hearing is blunted.

As the caries advances, the mastoid process becomes tender on pressure, and the integuments about it puffy; and, at length, the perforation of the bone being completed, the matter escapes, and forms an abscess underneath the integuments. The abscess does not burst readily, but extends itself upwards behind the ear; but there are examples in which it descends under the stylo-mastoideus, and points low down in the neck; it never extends backwards.

The caries of the mastoid cells does not confine itself to this outward direction, but next affects that part of the temporal bone which forms the posterior wall of the mastoid cells; the bone is here naturally thin, and, when carious, presents a worm-eaten appearance. Through these carious perforations the matter penetrates, detaches the dura mater, and gives rise to more decided cerebral symptoms. Should the patient survive, the caries will go on to ravage the internal ear; and in this way all the sinuosities and cavities, and bony fabric of the ear, are destroyed; and the petrous portion and mastoid process present one large carious excavation.

In the course of this general devastation, the portio dura and facial nerve are involved, which gives rise to neuralgic pains, convulsive twitchings, and lastly, to paralysis of the side of the face.

When the perforation has taken place internally, the dura mater, being now exposed to the irritation of the secretion from the ear, inflames and suppurates, and becomes detached, by the matter burrowing between it and the skull. In this stage, the patient is sometimes carried off by meningitis; at other times, the destructive process will go on to cause ulceration of the dura mater, and of the other membranes, and lastly of the brain itself.

It is at one of these periods of in-

flammation of the brain that the practitioner is commonly called in, and his first impression of the complaint is, that is an idiopathic meningitis; between which and the present case it is so far important to distinguish, that the blood-letting required to save the patient in the one instance would destroy him in the other.

In the inflammation of the membranes of the brain in cases of otorrhœa, there is a deep-seated severe throbbing pain in the middle of one side of the head, with great tenderness of scalp on the same side, so that the patient cannot lie upon it; the suffusion of the face is not marked, nor is the expression of the eye vivid, and though there is delirium, it is little active; the symptomatic fever is not ardent in proportion to the urgency of the local signs, and there is a marked exacerbation of the febrile state at night, while it is moderate in the day.

As, after a puriform discharge from the tympanum is once established, the subsequent mischief results from the retention of the matter, the chief indication in the treatment is to prevent such retention. This can be done only by washing out the tympanum by injections; because, notwithstanding the eustachian tube may be pervious, and its inclination favour the natural discharge of the matter, its canal grows so narrow as it approaches the tympanum that it offers an insufficient outlet in its sound state; and when tumefied by the diseased secretion, it is nearly closed, and in very many instances obstructed altogether. Little can be expected, therefore, from the natural evacuation of the matter by this canal.

The membrana tympani being perforated by ulceration, admits the use of injections by the meatus externus, by which means the tympanum may be cleansed without much difficulty; but the formidable obstacle to a cure is the lodgment of matter in the mastoid cells, the opening to which is, it will be remembered, at the upper part of the tympanum, so that when matter has once flowed into them, it cannot evacuate itself, nor be dislodged by injections through the meatus externus. There is only one means which suggests itself for the effectual removal of the matter thus retained, and that is, the

perforating the mastoid process by any fit instrument, so as to form a free external communication with the cells through which injections may be passed. In this way it would be practicable, by injections forced through this artificial communication, as well as through the meatus, to prevent any lodgment of matter either in the cells or tympanum, and thus do away the cause of the disease. Should the membrana tympani not have been perforated by ulceration, and the discharge have taken place only by the eustachian tube, the artificial perforation of the mastoid process would offer equal advantages, the injections then passing directly from the cells through the tympanum, and down the eustachian tube into the pharynx, and all the parts of the ear would be thus relieved from any lodgment of matter.

Before having recourse to injections, care must be taken to ascertain the exact stage of the disease, because they cannot always be used with safety. So long as the caries is confined to the ear, there need be no hesitation in administering injections; but when it has penetrated the skull, they are inadmissible, lest any part of the fluid should be forced within it, the consequences of which might be fatal. The character of the symptoms will point the extent of the disorganization, and inform us correctly whether it has reached the brain. While the disease has not extended beyond the ear, the sufferings are referred to this organ by the patient, the pain being deep seated in the ear, and radiating from it over the side of the head; but as soon as the dura mater and brain are involved, the symptoms of cerebral affection predominate, the complaints now being all directed to the brain. This diagnosis will be a safe guide, and should be borne in mind.

When the disease attacks the internal parts, every means must be adopted to encourage a return of the discharge, as fomentations and poultices to the side of the head; and blood-letting must be employed only so far as to keep down the inflammation.

Articles VIII. IX. and X. are cases from the pen of Mr. Custance, of Kidderminster.

CASE 1. *Fracture of the Os Calcis.*—

A woman, aged 50, was an outside passenger upon a coach, when it was overturned about half a mile from Kidderminster, on the 6th of November, 1824. She was thrown upon her left side, and the ridge of the top of the coach falling upon her left heel, fractured the os calcis, just below the insertion of the tendo Achillis. The fractured portion of bone was drawn up by the contraction of the muscles, as high as five inches from its former position. Next morning, after a minute examination of the foot, which exhibited a most singular appearance, partly from the swelling, and partly from the misplaced portion of bone, Mr. C. was satisfied that there was no dislocation of the joint, but that the distortion was occasioned by the fractured part of the os calcis having been drawn up to the situation described. Every attempt to replace it, was in vain. Notwithstanding the usual antiphlogistic means, extensive inflammation of the leg ensued, with sphacelation of the integuments, and sloughing of that part of the tendon which was attached to the piece of bone, and also of the cellular substance all around it, exposing it distinctly to view. It was, however, so firmly attached to the parts beneath, that it could not be moved in any direction. Its upper surface exfoliated; granulations, by degrees, filled up the surrounding parts, and the piece of bone was completely covered with new integument at the end of four months. It was between four and five months before the patient could attempt to walk, and the limb being much shortened, she was, at first, obliged to use a high-heeled shoe, but at the date of the report (Feb. 1829) she was able to walk as well as ever with a flat shoe.

The present situation of the piece of bone is $4\frac{1}{2}$ inches from its lower edge to the bottom of the heel.

“When the nature of this accident was first reported in conversation, it was not believed by any one to have been correct, but several medical gentlemen soon satisfied themselves of the fact by their own examination. Some eminent surgeons at a distance have assured me that no such case has occurred in their own extensive experience, and that they have never met with a similar one any where upon record.”

CASE 2. *Strangulated Hernia.*—The operation for strangulated hernia, when performed sufficiently early, is most commonly successful, and is of such frequent occurrence as to render its recital uninteresting and needless. But the following case is worthy of notice, as exhibiting the cause which probably made the operation ultimately inefficient.

J. P., aged 36, was wounded on the left hip, by a musket-ball, at Bergen-op-Zoom. The ball was never extracted, nor its situation ascertained. The patient suffered much and long from abscesses, and exfoliations of bone. At length the wounds healed, and he was discharged. On his return to Kidderminster, he was addicted to drinking, and suffered repeatedly from a strangulated scrotal hernia, which had with difficulty been as often reduced: unfortunately, he could never be prevailed on to wear a truss. In Sept. 1826 the hernia again became strangulated and irreducible, and Mr. C. performed the necessary operation. The portion of the strangulated intestine appeared quite free from gangrene, and even from any sphacelated spots, and was returned with part of the omentum. A small portion of this last was removed. Considerable inflammation of the surrounding parts ensued, extending to the left testicle, which suppurated, and was totally destroyed. Great sloughing of the integuments took place, followed by a small opening in the intestine, through which fæculent matter passed for some weeks, notwithstanding he had solid stools almost daily, per anum. After this, healthy granulations arose, and in about two months the whole wound was apparently closed. But unfortunately, inflammation again took place, followed by suppuration, and a fresh opening of the intestine, from which a piece of bone, and, a few days after, a round stone, as large as a grape, was extracted. The poor man then informed Mr. C. that the French were in the habit of loading their muskets with small stones, as well as with ball. The intestine gradually closed, and again opened from time to time. He at length, however, recovered his flesh and strength, notwithstanding a discharge of pus continued from a deep sinus at the top of the thigh. A very small fistulous opening remained in the intestine, although the fæces were discharged

almost daily in the natural way. Thus it went on for two years and a half, from the day of the operation till his death, which took place suddenly in the night of the 6th of February, 1829. The body was not examined.

CASE 3. *Foreign Body in the Rectum.* — On Monday evening, the 17th of February, William Haynes, a day-labourer, aged 50, informed Mr. Custance that he had been at work in the fields, and having “a call of nature,” he sat down to ease himself, when he was seized with cramp in his legs, and he fell upon an *inverted* blacking pot, which was lying upon the ground, and that the *whole pot* was thrust up into the bowels. On examining the anus externally, Mr. C. found the rectum a little protruded and swollen. On introducing his forefinger, he could feel nothing unusual, and thought the poor man had deceived himself; but passing his finger its whole length up the gut, he reached the inside of the *bottom* of the pot, and then, on a more minute examination, found that the whole of it was there, with the circular edge of its mouth behind the folds of the rectum, an inch, at least, beyond the sphincter. Every exertion of the author and his medical friends for an hour and a half, with different forceps, and by a gradual dilation of the sphincter, proved unavailing. He then introduced the small end of an iron pestle, and held it firmly against the bottom of the pot, whilst one of his friends struck the other end of the pestle with a flat iron. At the second blow they succeeded in breaking the pot into several pieces. The whole was extracted, piece by piece, with the forceps, or with the fingers, and the patient afterwards walked with assistance about a mile, to his own house. Next morning he laboured under extensive intestinal inflammation: he vomited incessantly; his pains were excruciating through the whole abdomen; his pulse was 120, and very full. Mr. C. immediately took from a large orifice between 40 and 50 ounces of blood, and gave him five grains of calomel and two of opium, and left his senior pupil with him, with directions to take away more blood at the end of two hours, if the pain and pulse should require it. This bleeding was repeated to about 12 or 14 ounces, and leeches were applied to the abdomen; notwithstanding which the inflammation con-

tinued to advance, and he died at night. The body was not examined. The pot measured $2\frac{3}{8}$ inches at its circular brim, $1\frac{1}{2}$ inch at its base, and $2\frac{1}{8}$ inches in its depth.

Art. XI. *A Singular Case of Ischuria.*

By CHARLES HASTINGS, M.D. Worcester.

On the 9th of April, 1814, M. H. aged 23, was admitted into the Worcester Infirmary. Within the last week she had been exposed to cold, whilst menstruating. For the first day or two she only suffered from slight fever; but soon afterwards the secretion of urine became deficient, and she had difficulty in passing it. On the evening of her admission she complained of pain and tenderness over the whole of the lower part of the abdomen, and in the loins; there was vomiting, and a disposition to convulsion. The lower part of the abdomen was much distended. Ten ounces of urine were drawn off by the catheter; after which the pain was relieved. She had purgative medicines. The next morning the bowels had not acted. She had severe head-ache, as well as abdominal pains; she had passed no water, and had been delirious during the night. She was cupped on the back, had a blister applied, and took cathartic mixture every four hours till the bowels moved freely; after which she went into a warm bath. On the 25th there was much vomiting, pain, and distention of the abdomen, but she passed a little urine. On the 27th a bloody discharge appeared at the umbilicus, after which the abdominal pain and tension were relieved. She also passed some urine by the urethra. The bloody discharge from the umbilicus, and the other symptoms, continued very much the same till the second of May, when there was a discharge of an urinous appearance and smell from the umbilicus. She had passed no urine by the urethra for three days. The catheter was introduced, but no urine found in the bladder. This discharge of urine from the umbilicus continued till the 5th, when the catamenia appeared, but quickly vanished. From the 7th to the 9th there was no discharge of urine from the umbilicus, nor was there any passed by the urethra. On the 10th, in the morning, six ounces of urine were drawn off by the catheter; and in

an hour after, two quarts of urine, of the same appearance, gushed from the umbilicus. This was followed by much relief of the abdominal pains. The discharge of urine from the umbilicus continued for three days, and was accompanied with great improvement of the general symptoms. On the 17th the catheter was introduced into the bladder, and no urine was found. In an hour after this two quarts of urine passed from the umbilicus, and soon afterwards great relief was experienced. From this time to the 25th there was little variation, but the young woman suffered during that interval very much from vomiting, and daily passed urine from the umbilicus. The catheter was passed every day, and no urine was found, but the bladder contracted strongly on the instrument. On the 26th, for the first time after many days, four ounces of urine were drawn from the bladder. Each succeeding day this quantity was now increased, and the quantity passed by the umbilicus was diminished. The bladder was regularly emptied every day by the catheter for more than a month after this date, during which time the abdominal pain and vomiting subsided, and there was no discharge from the umbilicus. Early in July she began to pass some urine, and the power over the bladder was gradually restored. She was discharged in the middle of July in tolerable health.

“ This curious case of ischuria is well worthy of consideration. The remarkable sympathy observable between the brain, the stomach, and kidneys, is common to all cases of this description, and is so obvious as not to require any further comment. The very remarkable feature in the case, is the occurrence of the urinary discharge from the umbilicus many days after the ischuria had been noticed. Such instances, although rare, are not without parallel in the annals of medicine. Shenck relates two instances of this kind. In the one, a male, the urine was discharged in consequence of an obstruction at the neck of the bladder, ‘*tanquam mictione ex umbilico*,’ for many months, without any detriment to health. In the other, a female, and more resembling the one now related, ‘*cum suppressa per multas dies fuisset urina, tandem per umbilicum urinam profudit*.’—Shenck Obs. Lib. iij. de Urina. p. 489.

“ The interesting question is to determine in what manner the urine is conveyed to the umbilicus in these instances. The urachus offers itself as a mean by which the discharge may be determined to that part, and it seems probable, that in the case of mechanical obstruction related by Schenck, at the neck of the bladder, that a channel of communication was formed by the urachus, between the bladder and the umbilicus. But in the case we now remark upon, there had been no urine secreted into the bladder long before its appearance at the umbilicus, nor was there for some time after; and the first discharge from the umbilicus was not of an urinary, but bloody nature. We must, consequently, I think, regard the urinary discharge in this instance as vicarious, and as proceeding, probably, from the peritoneal surface. This view seems confirmed by the great abdominal distention which took place for some time previous to the discharge from the umbilicus, when it was invariably found, from introducing the catheter, that the bladder was empty, and that it contracted on the instrument.”

Dr. Hastings adds, that the young woman was again admitted into the infirmary in May 1827, for paralysis of the lower extremities, from which she recovered by appropriate remedies. The urine, for a time, was drawn off by the catheter, but there was no return of the former disease.

Art. XII. *Case of Apoplexy occurring at the full period of Utero-Gestation.*
By Mr. G. JONES, Alcester.

The nature of this case is sufficiently explained by the title: it contains nothing which appears to merit extraction.

Art. XIII. *Observations upon the Use of the Ergot of Rye.* By Mr. DAVIS, Surgeon, &c. Pershore.

Few medicines, says Mr. Davis, have obtained so high a degree of celebrity, in so short a space of time, as the ergot of rye; few have so completely possessed the confidence of the practitioner; and no medicine that has ever been introduced appears to me to be so much calculated to main-

tain the important situation in which it is at present placed. Solitary cases are of trifling importance; the utility of a medicine can only be ascertained by its frequent administration; consequently, the greater the number of well authenticated cases which are brought forward to support its claims, the more it deserves to be valued. The ergot has been given in a great number of cases which are recorded in different medical journals. It has many very strong claims to our attention; its powers are "sui generis," and really wonderful. Under favorable circumstances, it will bring on and end a labour in an hour, which might have gone on for days, thus saving the practitioner much harassing anxiety, as well as rescuing the most amiable and interesting portion of our species from much mental distress, and acute and unnecessary suffering, and in all human probability, in many instances, from an untimely grave. I beg you to understand, that I do not by any means recommend its administration upon all occasions; far from it. I think it requires the greatest caution, and that it is likely to do incalculable mischief and irreparable injury, when injudiciously given.

1.—It ought rarely to be given in first cases.

2.—It ought not to be given if the pelvis be not capacious.

3.—It ought not to be given unless the parts be well dilated.

4.—It ought chiefly to be given in cases where the labor is unusually tedious, in consequence of want of action in the uterus.

5.—In many cases of hæmorrhage during parturition, and in retention of the placenta.

If the parts be properly dilated and lubricated, and if the uterus be acting feebly and inefficiently, one dose of ergot will, I am fully persuaded, in nine cases out of ten, end the labour satisfactorily within an hour. It would be highly improper to give it in cases of impaction: in any presentation, excepting a natural one, or where there is a want of proper proportion between the child's head and the pelvis of the mother; or where there exists any rigid contraction of the soft parts.

CASE I. January 27, 1826.—I was sent for about 6 o'clock in the evening, about three miles from home, to an unmarried female; first child. Waters

broke the evening before. Pains very feeble, and far between; the friends were very anxious, and would not permit me to return home. 28th.—Much as yesterday; the os uteri dilating very gradually. 29th.—Head slowly descending into the cavity of the pelvis. 30th.—Parts well dilated and lubricated; head completely in the pelvis. I had never given the ergot; I thought this, though a first child, a fair case for the trial of its powers. At 6 A.M. I gave her ten grains in powder; I fancied the pains were more frequent, but not much increased in strength. At 9, I gave her a scruple in a cup of tea; in sixteen minutes the pains came on very strongly, and she had scarcely a second's rest until half-past 10, when the child was born; the placenta immediately followed; hæmorrhage moderate; mother and child did well.

CASE II. February 25, 1826.—At 2 A.M. I was sent for to Mrs. S. five miles in the country; fourth child. The pains were pretty strong, and at regular intervals, returning in a few minutes. I was in hopes all would have been soon over; however the pains gradually died away. At 11, the parts being fully dilated and well lubricated, head in the pelvis, I gave her a scruple of ergot. In twelve minutes the pain returned powerfully, and lasted until the child was born; placenta soon followed. Mother and child did well. She has had one since without difficulty.

CASE III. April 13, 1826.—I was requested to attend Mrs. P. six miles from home; seventh child. I saw her at 10 P.M. Pains very weak and long between. I waited until 7 next morning, before I gave her the ergot; she would not take the powder. I infused 3iss. in iv. ounces of boiling water; she took the whole of the infusion; the pains came on immediately, and the child was born in a very few minutes; the placenta followed: hæmorrhage moderate; mother and child did well. She has been confined since without difficulty.

CASE IV. October 5, 1827.—At 8 A.M. I was called to Mrs. H.; fifth child. Pains remarkably strong, and very long; the head descended rapidly into the pelvis; one pain more would have brought the child into the world; they stopped suddenly. She fell asleep, and slept nearly five hours; no signs of pain. I gave her a scruple of ergot;

the pains came on strongly; the child was immediately born, the placenta came with it; the pain continued for full ten minutes after, unabated. I gave her 60 drops of Tr. opii. which relieved her. Mother and child did well.

CASE V. May 22, 1828.—At 2 A.M. I was sent for to Mrs. W.; first child. Pains weak; long rest between. By 1 P.M. there was but very little alteration; the child's head had, it is true, been gradually descending, but it was very slowly; the pains increased in frequency, but not at all in strength, remaining on but a very few seconds; by 3, the head was in the pelvis; the membranes were still entire, and the parts were not so well dilated as I could have wished. At 4 I gave a scruple of ergot; the pains increased in strength, and at 5 the child was born; the placenta soon followed; the hæmorrhage was very considerable. She went on very well for the first three days; on the fourth day she had a shivering fit, with a good deal of pain in the left iliac region; pulse weak and frequent, about 100; she had twenty leeches to the part affected, and took effervescing medicine, with calomel and opium. Rather better the following day: still pain on pressure; twenty more leeches were applied, and she continued her medicine. She daily got better, and was soon well.

CASE VI.—About 7, immediately on my return from Mrs. W. I was requested to go to Mrs. —, who had been very ill all day; first child. The pains were very strong, and the child's head was entering the pelvis. I congratulated myself on its being likely to be over soon. I was most egregiously mistaken; the pains continued exceedingly strong, but not bearing down during the whole of the night, with scarcely half a minute between. They were severe in the extreme; I never saw a woman suffer half so much pain in my life. She tossed herself about the bed, and put herself into all manner of attitudes, but to no purpose; the pain was most excruciating, and appeared to be, if possible, increasing, and without one second's interval. Her screams were truly distressing. At 5 I gave her 80 drops of tinct. opii.; I repeated it in ten minutes; she was rather easier for about half an hour. I then gave her 80 drops more, as the pain appeared to return; she slept, or rather dosed, for nearly an hour, when she started up

and screamed as loudly as ever, and said the pain was ten times worse. I was puzzled what to do. I was afraid of giving her more opium.

It appeared to me to be a case of irregular contraction of the uterus, that is, of contraction of the transverse fibres of that organ, without the assistance of the longitudinal fibres, for the head did not move, although it was almost in the pelvis; the os uteri was well dilated, and there was a proper secretion of mucus, but still things seemed to remain "in statu quo." After considerable hesitation I ventured to give a scruple of ergot; I had the pleasure of observing, in half an hour, that the character of the pains had materially altered, and in an hour and a quarter a dead child was born. The woman did well. In a few days she had a slight attack of fever, which soon subsided.

Art. XIV. *Case on the Ergot of Rye.*

By GEORGE WALDREN, of Bath.

This appeared to the author to be a case of irregular contraction of the uterus—"that is, of contraction of the transverse fibres of that organ without the assistance of the longitudinal fibres." The head did not advance, though it was almost in the pelvis, and the pains were excessively severe. The os uteri being well dilated, Mr. Waldren, after "considerable hesitation," gave his patient \mathfrak{Dj} of the ergot. In half an hour the character of the pains had altered, and in an hour and a quarter the child was born, dead. The woman did well.

Articles XV. XVI. XVII. and XVIII. are reports of cases, and statements connected with public institutions. Whatever is worthy of notice will be found among our Hospital Reports.

Art. XIX. *Grub in the Cerebellum of a Horse.*

The following curious case is related by Mr. Rose, Veterinary Surgeon:—

"On the 2d of July I was requested to attend a three-year old colt, labouring under the following symptoms:—Loss of voluntary power of the left

(near) extremities, therefore unable to stand without support; inclining the head to the same side; an oblique direction of the eyes; no delirium; pulse 60; breathing little interrupted; fæces and urine passed without difficulty; extremities and skin warm; and would take food when raised. No external injury could be detected.

“There was little variation in the symptoms until the 11th, when, on endeavouring to raise him, he died.

“*Treatment.*—Repeated general and local bleeding, active purging, setons and blisters to the head and neck.

“*Post mortem examination, 24 hours after death.*—On dividing the head from the neck, at the first joint, three or four ounces of dark-coloured serous fluid escaped; on removing the coverings of the brain, three coagula of blood were seen on the right side of the cerebellum; upon raising it, another presented itself, out of which crawled a grub (in size very like those taken from nuts, but much more transparent); considerable extravasation of blood into the membranes beneath it; also an effusion of the same kind of fluid above-mentioned in the whole cavity of the cranium.

“The cerebrum was healthy, excepting its vessels being more turgid than usual. The contents of the thorax and abdomen (as I anticipated) I found quite healthy.

“It may be well to observe, Mr. Kitsell, surgeon, of Droitwich, was present at the dissection, and that I have the grub in my possession.”

Art. XX. *Rupture of the Trachea of a Mare.*

A mare was kicked by a colt, Aug. 5, 1825, upon the windpipe, about midway between the larynx and bronchial tubes, with such violence as to rupture the trachea. The skin was not at all injured, or even the hair erased, the colt having no shoes on. The mare shewed symptoms of uneasiness immediately after the injury, in consequence of which she was taken out of the team and bled copiously. In the course of the day she increased in bulk very considerably, and by the following morning had attained an enormous size. It was then (on the 6th) that Mr. Corbett (by whom the case is detailed) saw her: he very

readily discovered the rent in the windpipe with his finger. The mare did not seem to be in much pain, but was dull; pulse about 60, and not hard. The swelling was entirely emphysematous; it pervaded the whole exterior of the body, extending from the tips of the ears to the basis of the tail.

He gave submuriate of mercury, in a full dose, and afterwards a cathartic bolus. He also applied a bandage round the neck, moderately tight, having first placed a compress exactly upon the injured part; this he directed to be kept constantly wet with an evaporating lotion. The mare was placed in an airy loose stable, warmly clothed (the skin feeling rather cool), and a good deal of friction frequently used. The bowels soon moved very freely, after which the emphysema considerably decreased. In about a week union took place between the integuments and the injured part, so as to preclude the possibility of further escape of air into the cellular texture. Friction was still applied to the skin; she was walked out an hour every day. Under this treatment she perfectly recovered, and by the middle of September was able to work as usual.

Some meteorological tables conclude the number.

MEDICAL GAZETTE.

Saturday, June 6, 1829.

“Licet omnibus, licet etiam mihi, dignitatem Artis Medicæ tueri; potestas modo veniendi in publicum sit, dicendi periculum non recuso.”—CICERO.

ANATOMICAL BILL.

THE second reading of the Anatomical Bill in the House of Lords, which was appointed for Tuesday, was again postponed till last night (Friday), so that we are unable to give the result. The general opinion is, that the measure will be lost; indeed, a considerable number of the Peers have already expressed themselves hostile to it, and we

understand this to be the sentiment of nearly all the Bishops.

To an unconcerned spectator, it must be curious to observe the different feelings which exist in different branches of society upon this subject. The great majority, indeed, are totally indifferent about it; but of those who take a concern in it, some oppose the bill because it grants too much, others because it grants too little—some object to the principle in toto, others only object to the details; still the general result is a feeling hostile to the measure.

We have Wakley declaiming against the bill, because some wag made him believe it emanated from the College of Surgeons, who have actually petitioned against it—we have those two political mountebanks, Hunt and Cobbett, introducing the subject at a public dinner, and quoting the scriptures to prove that it is contrary to religion—and in the Morning Herald we have measureless absurdities from “the City” about the price of bodies and the price of stocks.

The celebrated manufacturer of shoe-blackening, the hoary exhumator of Paine’s bones, and the writer last mentioned, may be looked upon as the representatives of the ignorant and illiberal part of the community; and *they* oppose the bill, not because it interferes with the rights and privileges of any man or set of men, but because they are pricked in conscience, and feel a holy horror at the idea of disturbing the remains of the dead. Besides, they regard medicine as a branch of knowledge neither requiring nor meriting the very moderate encouragement which the Government are disposed to afford it. Indeed the Herald is of opinion that “Doctors” do more harm than good, and that the practitioners in London especially, annually poison many hundreds of their patients. The following specimen from a recent leading

article in that paper, if not very instructive, is at least amusing:—

“The anatomy or dead body bill:—Putting aside for the present the question as to the generous and noble propriety of the Government of the country taking advantage of the unfortunate, and cruelly adding to the dreadful miseries of the friendless and forlorn wretch who dies in a workhouse or hospital, the appalling prospect of having his body, after death (a period which all look forward to as the season of rest) consigned to be mangled and torn by the knife of the ruthless anatomist—is far from being popular among the members of the medical profession, for whose benefit and that of science it is so artfully said to be intended. * * * *

“This most obnoxious measure has, in fact, emanated from, and is only supported by, the influence of the hospital surgeons of London, solely for the purpose of filling their own pockets, by holding out the temptation to pupils to enter to their lectures, of a plentiful supply of subjects, which they well know none but those connected with large institutions can possibly obtain. This narrow-minded and illiberal body, whose selfish policy is completely at variance with the opinion of the medical profession at large, are now, under the mask of benefitting the poor and promoting science, pushing forward, for the purpose of a disgusting gain, a measure most cruel and appalling to the wretched and friendless, highly inimical to medical knowledge, and totally at variance with the dictates of morality and religion.”

Such a piece of *galimatias* is too absurd to require an answer: either the writer is a fool, and believes what he has said, in which case he *could* not be undeceived—or else he is a knave, addressing himself to the prejudices of the ignorant, and in this case he *would* not be undeceived. As to the assertion that the measure, which the same paper elsewhere calls “filthy and sanguinary,” emanated from the hospital surgeons of London, it smacks of the Lancet; as does the language in which it is couched—and is about as correct as the asseveration of the latter Journal,

that it emanated from Lincoln's-Inn-Fields. We have looked over the Red Book, and find that, between surgeons and assistant-surgeons to the hospitals in London, there are more than thirty; *of whom, not more than six or seven lecture on anatomy!!*

But it is not the ludicrous blunder of Wakley, nor the ravings of Hunt and Cobbett, nor the bathos of the Herald, that form the real obstacles to the passing of this bill: these are to be found in the opposition of some of the corporate bodies, from an apprehension of its interfering with their rights and privileges—and, we regret to say, in a decided hostility among the Peers to the *principle* of the bill. The former might be got over; the latter, if the majority shall be found to agree with those who have already expressed their opinions, must be fatal.

Mr. Sadler, in the lower house, may be regarded as having expressed the general opinion of this class of opponents. He declared his opinion, that “it would close the doors of those houses of mercy which our ancestors have dedicated to the purpose of succouring afflicted poverty.” Did it never strike Mr. Sadler, and those who entertain similar opinions, to inquire what happened in other countries? Are they aware that on the continent the plan of giving up the unclaimed bodies of those who die in hospitals has long been adopted, and found to answer? Or if he supposes that there is any such difference in national character as to account for its reception by one people and rejection by another, we refer him to what occurred in Italy less than a century ago, when Benedict the Fourteenth, “the Protestant Pope,” adopted the very measure now in agitation. “The houses of mercy” were for a time deserted, but the time was very short; the prejudices even of the lower orders yielded to their reason; the hospitals were filled as before; and the measure,

at first limited to Bologna, was soon adopted in the neighbouring states, and by enlightened foreigners—all, save England. Here alone a bar was placed against the first step in the most useful of all the arts; here alone the members of our profession were compelled by the legislature to acquire a knowledge of anatomy through the power granted to different corporate bodies—and prohibited from doing so by the statute-book;—here alone it was illegal either to move or to stand still; here alone one law could only be obeyed by violating another.

To medical men the fate of the bill can signify but little: let it be rejected—let our lawgivers in their wisdom prohibit Anatomy altogether—let our students adopt the plan of the Herald, and learn the structure of the human body from paper, and practice surgical operations on figures of paste-board and plaster. So much the better for those now in the profession; all medical practice will become theirs in reversion. But woe to those who first come under the hands of paper anatomists and pasteboard operators! The rich, indeed, will be able to command the services of the educated and experienced while the present generation lasts, but the poor must be content with what they can get. To this must it come at last, and the only end attained by the pseudo-philanthropists who now oppose the Bill, will be that of “cruelly adding to the dreadful miseries of the friendless and forlorn wretch, who *lives* in a workhouse or hospital, the appalling prospect of his body *before* death consigned to be mangled and torn by the knife of the ruthless anatomist.” How often must we repeat that operative skill, *if not acquired on the dead, must be acquired on the living!*

How astonishing it is that men should be found blind, infatuated, and bigotted enough, not to suffer that the bodies of

those who have no friends whose feelings can be outraged, should be dissected, rather than that the whole community be kept under the dread of exhumation, and the graves of all be exposed to the visit of the ruffian exhumator. "If it be an object deeply interesting to the feelings of the community, that the remains of friends and relations should rest undisturbed, that object can only be effected by giving up for dissection a certain portion of the whole, in order to preserve the remainder from disturbance *." Nay, if this bill does not pass, what becomes of the public apprehension of *Burking*? Even some of those noble Lords who oppose the measure, from their conscientious horror of disturbing the remains of the dead, may, ere another session, have causes nearer home to lament the continuance of the present system.

The present bill is a clumsy one, we allow, and objectionable in various particulars: it is not, however, on these points that it is likely to be rejected, but on the principle of giving up unclaimed bodies; and it is for this principle we contend, and which we are most anxious to see recognized. At all events, and happen what may, the Medical Profession have most disinterestedly come forward to represent the necessity of affording protection and support to their science; otherwise, it must fall into comparative decay, not with themselves, but with those who are to follow, and to be their future rivals. In conclusion, we aver that if this Bill, or one similar in its objects, be not passed, the fault will lie with the legislature, the loss with the public, and the profit with us.

ST. GEORGE'S HOSPITAL.

On Friday last (May 29), Dr. Wilson was unanimously appointed Physician to St. George's Hospital, in the room of Dr. Young.

* Report of the Anatomical Committee.

COLLEGE OF PHYSICIANS.

Monday, June 1.

Case of Tic Douloureux, by the celebrated Locke.

A LITERARY curiosity of great interest was laid before the Meeting: a case detailed by the celebrated Locke. This curious document was obtained by Dr. C. M. Clarke, from Lord King, and presented to the College. The original MS. was laid upon the table, and consisted of a French Almanack, bound up with a number of leaves which had been originally blank, but which were filled with various notes and memoranda in the hand-writing of Locke, and among others the case in question.

It has often been doubted whether Locke ever practised as a physician, but the question is now set at rest. In Lord Grenville's pamphlet, entitled "*Oxford and Locke*," he remarks, that, "in the printed life of Locke, commonly prefixed to his works; we are told that he applied himself, at the University, with great diligence, to the study of medicine, 'not with any design of practising as a physician, but principally for the benefit of his own constitution, which was weak.'" His lordship goes on to observe that no such motive is ascribed to Locke by Le Clerc, from whom our knowledge of his private history is principally derived; nor, indeed, is the supposition at all probable. Le Clerc, however, asserts "that Locke never practised physic for profit, though he was highly esteemed by the ablest physicians of his time." In proof of this, we need only quote the following passage from Sydenham:—"Nosti preterea quam huic meæ methodo suffragantem habeam, qui eam intimius per omnia perspexerat utrique nostrum conjunctissimum, Dominum Joannem Locke; quo quidem viro, sive ingenio judicioque acri et subacto, sive etiam antiquis, hoc est, optimis moribus, vix superiorem quemquam, inter eos qui nunc sunt homines, repertum iri confido, paucissimos certe pares."

Lord Grenville says, that the assertion that Locke had never actually practised, is "unquestionably erroneous;" and the case which we subjoin proves the correctness of his opinion.

Locke was called to see the Countess

of Northumberland, who was the ambassador at Paris, Dec. 2, 1677. The case was evidently one of *tic douloureux*. It is entitled *Convulsio*, and the symptoms are thus described:—Acute pain over the right cheek up to her ear. In the intervals, pain in the teeth. She was warned of the approach of the fits by a throbbing she felt in the lower jaw, where she had had a tooth drawn the previous summer. The fits had been preceded by three or four days of ordinary tooth-ache. There was no swelling, or inflammation; no flux of rheum; no external swelling; no indication for bleeding; besides which, that remedy had been tried some months before, without effect.

“It being night,” says Locke, “I thought at present there was nothing to be done but to give her ladyship present ease by some topical application.” He thought first of a blister, but paused till he had made some more general evacuation. He therefore ordered an opiate embrocation to the gums, which gave her much relief. On the following day (for the case is related in the form of a journal) he again deliberated about the propriety of the exhibition of an aperient, but the extreme cold weather made him conclude in the following manner. “I apprehended that a purge, which I thought very necessary, would be dangerous in such a season, because, if weak, it might cause disorder with very little or no evacuation; if strong, in so delicate a constitution I could not tell how to venture; besides that, I feared she might take cold in the working, which might increase the mischief.”

The result of his prudent caution was, that he prescribed a drop of *æthereum terebinthinæ* on a little lint, which she applied to the gap whence the tooth had been extracted, but it did not allay the pain, and he then ventured upon the purge, and gave a mercurial one, which “wrought very well seven or eight times.”

After the operation of this medicine he prescribed an opiate draught, and during the following night she enjoyed some sleep. With occasional exacerbations, the fits upon the whole began gradually to abate in severity. He describes most accurately what we all know to be the truth in this cruel disease, how various slight causes bring on the paroxysm of pain; how touching any part of the affected side of the

body (even the foot of that side), talking, or opening her mouth to eat, brought on the twitches of pain. He reasons upon this strange nervous affection very sensibly, considers what the original mischief was, and how far the extraction of the tooth had to do with the increase of the malady, and concludes that the root of the mischief lies in some harm done to the nerve connected with the tooth. The tooth itself, when it was drawn, was found to be a sound one, and its extraction so far from a remedy, that it increased the violence and frequency of the fits. Locke continued in attendance till Dec. 16th, a space of a fortnight, when he pronounced the lady ambassador “quite well.”

On Monday, Dec. 20, he writes in his MS.—

“Memorandum: that my lady ambassador’s gums itched vehemently after the pain was gone, and did so for several days after; and used to do so for several years before any tooth was drawn.”

Observations on Insanity. By SIR H. HALFORD.

After the above had been read,

SIR HENRY HALFORD stated, that, in consequence of having understood that there was no paper for the present evening (for Locke’s case had only just been received), he had hastily thrown together some observations on insanity. As there was sufficient time left, he would read them to the Meeting.

Sir Henry observed, that, in the closet scene in *Hamlet*, the following words occur:—

“————— Extacy!

My pulse, as yours, doth temperately keep time,

And make as healthful music; ’tis not madness That I have uttered; bring me to the test, And I the matter will reword—which madness Would gambol from.”

The circumstance to which the learned President particularly alluded, was the expression “I the matter will reword;” and he proceeded to relate the following case, in illustration of the justness of Shakspeare’s “test.” He was called, last January, to a gentleman then in a state of mental derangement. A short time previous to his illness, he had sent for his solicitor, and given directions about his will. He stated his intention of adding 500l. a-

year to his mother's jointure, and of leaving various legacies; adding that his friend, the solicitor, was to be residuary legatee. The solicitor, in the most honourable manner, told him that he could not consent to the last part of the arrangement unless at the end of six months he continued of the same mind upon the subject. In the interval, he was attacked with mental excitement, for which he was attended by Sir Henry Halford and Sir G. Tuthill. One day, on asking him how he did, he appeared calm and collected, and answered that he was very ill, and only anxious to settle his affairs and make his will. Next day he repeated the same expressions, in a tone and manner which induced his attendants to comply with his request, and the solicitor was sent for, who brought with him a will drawn up according to the instructions he had formerly received. This was read over to the gentleman, and being asked, after each clause, if such was his meaning, he distinctly replied—yes, yes. The will was then executed, being witnessed by his physicians. On going down stairs, Sir Henry observed upon the unpleasant circumstance of the medical attendants becoming involved in a deed which was likely to become the subject of litigation, and proposed that they should return to him, and apply Hamlet's test, by ascertaining whether he could "reword" his will. With regard to several of the clauses this was the case; but he stated that he had left one individual ten thousand pounds, whereas he had only left him five thousand; and on being asked to whom the residue of his fortune was to go, he answered, "To the heir at law, to be sure!" Being asked who was the heir at law, he replied that he did not know. Thus, said Sir Henry, he could not "reword" his meaning, but "gambled" from the matter.

The author then adverted to the fidelity of the pictures drawn by Shakspeare, so justly characterized by Johnson as the poet of nature. He also alluded to the writings of the ancient poets, as containing many descriptions which might be recognized by an attentive observer. He had himself seen two of the cases mentioned by Horace, illustrated to the very life. One, a man of high rank, supposed himself present at a theatrical entertainment, and Sir Henry had heard him urging

Garrick to exert himself in the part of Hamlet, which he supposed him then to be acting. The other case was that of a gentleman of large fortune who possessed himself of every thing he could get, but parted with nothing. He was brought from the Court of King's Bench, having refused to pay for a picture which he had bought, and which was valued at £1500. Sir Henry told the jury, that if they would go to the gentleman's house, in Portland-Place, they would find £50,000 worth of property; among the rest this very picture, with baby-houses and baubles strewed over his dining-room.

The paper was listened to with great interest, and this was increased by the very animated manner in which it was read by the learned President.

PROCEEDINGS OF SOCIETIES.

HUNTERIAN SOCIETY.

May 27, 1829.

DR. FRANCIS RAMSBOTHAM IN THE CHAIR.

DR. F. RAMSBOTHAM related a case which, though not singular, was interesting, inasmuch as it shewed what nature could effect in cases of extra-uterine foetation. The woman is æt. 46, and has had three children. In July 1819 she became pregnant the last time. The enlargement was most perceptible in the left side. No motion had ever been perceived in the foetus. At length uterine pains came on, with a sanguineous dribbling, and the discharge of some pieces of solid matter. A secretion of milk in the breast ensued, and continued for some time. In a few months she became regular, but she lost flesh and sunk in strength, and derived no benefit from the means employed. At the end of 1827 she ceased to menstruate. In April 1828, the excretions from the bowels became foul and offensive, and the tumor began to diminish. About this period, bones began to appear in the fæces: a thigh-bone, vertebræ, bones of the skull, &c. Three weeks ago the bones ceased to pass; the motions have become natural, and the woman is pretty well. The doctor adverted to six other cases that have fallen under his care: in

three, death occurred from rupture of the sac; in another, the child died at eight months, from the mother's having a fright—she carried it till ten months, and died: the foetus was found putrid. In another, the whole foetal bones passed per anum, and the woman recovered. In the sixth case, the foetus has been retained twelve years, and within this period the doctor has twice attended the woman in confinement.

MR. MACMURDO related a case of lithotomy, in which the operator, on introducing the gorget, observed that it passed the calculus. Instead of being in the bladder, it was found encysted in the membranous part of the urethra. It was the size of a large walnut, flattened, with two cornua. It was supposed to have escaped from the bladder when small, and to have become embedded in the membranous part of the urethra. The symptoms of stone had been very slight*. Mr. Macmurdo also reported an instance of extirpation of the thyroid gland. It had been greatly reduced by iodine, and then remained stationary. The woman's health had been impaired by the remedy, and she entreated the removal of the gland. She appears to be doing well.

DR. HODGKIN said, that he attended the meeting for the purpose of mentioning that he had learnt, since he directed the attention of the Society to the subject of retroversion of the valves of the aorta, that M. Bertin had previously described the same occurrence. His words are, "*Nous avons vu les sigmoïdes déjetées et en quelque sorte renversées vers les parois de l'aorte. Cependant nous avons observé aussi une disposition inverse pour ces dernières, comme si pendant la systole de l'aorte, le sang les avait resoulées vers la cavité ventriculaire.*"

DR. RAMSBOTHAM described a case of polypus uteri, in a young unmarried woman. The peculiarity of the case consisted in the frequent retraction of the tumor within the uterus, so that at times it could not be felt.

MR. COOKE reported a very aggravated form of *urticaria febrilis*. The swelling of the limbs and face, and the pain of the joints, were extreme, and the eruption was much more vivid than ordinary.

* See our Report from St. Thomas's Hospital.

HOSPITAL REPORTS.

ST. THOMAS'S HOSPITAL.

Lithotomy—Calculus in a Cyst anterior to the Prostate.

A YOUNG man, who had been subject to the symptoms of calculus from his infancy, and who had been proved to be labouring under that affection by the decisive test of sounding, was brought into the operating theatre on May 22d. Mr. Green commenced the operation by introducing the staff. The stone was easily felt, but appeared to be very near the neck of the bladder, so as to prevent the complete introduction of the sound. Mr. Green suspected that a process from the stone was projecting into the urethra, and thence concluded that the whole mass must be very large. An incision was made in the usual way in the perineum, in which the transverse artery was divided, and bled so profusely, being much larger than usual, that it was necessary, before the operation was concluded, to pass a ligature round it. The urethra having been laid open, the gorget was passed into the bladder. Such excessive hæmorrhage followed the division of the prostate, that, if such an event could possibly have happened, it might have been supposed that the internal pudic was wounded. But as it was plain that the incision had not gone near this vessel, and as the blood came from different sources, the suspicion was abandoned as soon as taken up. Mr. Green now passed in the forceps, but at first he could not find the stone. The forceps appeared to have passed it. At length it was found anterior to the prostate in a cyst, with perfectly smooth sides, and being laid hold of, was easily extracted. It was composed of lithic acid; was in shape an oblate spheroid, considerably flattened, an inch and three-quarters in its longest diameter, and had on one of its sides two very curious projections, each four lines in length.

The patient has done well up to the tenth day from the operation.

It is most probable that there was originally a very small stone, which having escaped into the urethra, there became impacted, and received gradual accumulations until it acquired its greatest magnitude. The hæmorrhage most probably came from a number of vessels enlarged by the irritation of the stone.

G.

ST. GEORGE'S HOSPITAL.

I. *Remarkable instance of the Constitutional Nature of Fungus Hæmatodes.*

ON the 24th of last April the dissection of

Mary M'Carthy, ætatis 32, took place in this hospital.

Head.—On turning down the flaps of the scalp there appeared upon the calvarium several tumors, looking like those of fungus hæmatodes, and all receiving a covering of sound and unbroken, but thin, pericranium. They were three in number. One was situated on the frontal bone, over the superciliary ridge, towards its outer angle: its circumference equalled that of a small orange, and its greatest projection was nearly an inch above the level of the neighbouring bone. The second tumor was seated over the left parietal bone, at the top of the head, and not so large as a half-crown piece. The third was nearly, if not quite, the size of the first, placed far back in the occipital region, to the right of the median line.

The calvarium was removed with the dura mater attached to it. The membrane, looking from within, was found to be free from ulceration at the site of the tumors, but under each it presented an injected and inflamed appearance, more or less determinate. The dura mater was stripped from the bone, when it was found to be attached to the root of each tumor by adhesions, which, however, were readily torn through.

The tumors themselves were of the genuine medullary character. They were in contact with the pericranium externally, with the dura mater internally, and the intermediate bone was more or less absorbed, and blended in spiculæ with the diseased mass. The degeneration had demonstrably commenced in the diploë, for the destruction of this was much more extensive than of either of the outer tables; indeed, the medullary matter was in some parts contained in the diploë, whilst the outer and the inner tables yet remained entire. The tumor at the corner of the eye had made its way through into the orbit, and had not pierced the periosteum of that cavity. Nothing unusual was observed about the brain, or its more immediate investing membranes.

Thorax.—There was no effusion into the cavity of the pleuræ, nor other marks of inflammation of the membrane. The lungs presented in one or two parts small medullary depositions.

Abdomen.—The liver presented an exquisite specimen of the disease. Medullary tumors of various sizes were found in its substance, and towards the under part of the left lobe was a very large one. In those which were most mature, a kind of ulcerated cavity was contained in the centre. In all, the outer portion constituted a sort of cortical substance, finer grained and more compact than the central, which was coarse and rough. In each of the kidneys were several cysts, containing a drachm or more of greenish fluid, with membranous septa running across them. They were chiefly in the tu-

bular substance of the viscus. In several parts of the cortical substance were pale, fibrous-looking patches, not tumors, resembling what are frequently met with in the organ. There was much thickening about the cervix uteri, and the section shewed a surface really not unlike commencing medullary fungus.

In the situation of the left mamma was a tumor the size of a walnut, of medullary structure; and towards the axilla were one or two more, apparently lymphatic glands, disorganized in this way. The right mamma, which was shrunken and withered, had not, when cut into, a natural appearance.

Over the left patella was a diseased bursa. It was a perfect cyst, and readily dissected from the subjacent ligament and bone. Its walls were quite cartilaginous, and three or four lines in thickness. Its cavity contained a yellowish lacerable substance, half lymph half pus.

So much for the dissection, which we have given first, on account of its very interesting character, and we shall now proceed to relate briefly the history of the case.

The patient was first admitted into the hospital on the 24th of December, 1828, with malignant-looking, ulcerated tumor of the left breast, of seven months' duration, and originating; it would seem, in suppression of the milk. It had first ulcerated three weeks prior to admission, and hæmorrhage had occurred more than once during that short period. The fungus being in a foul and very sloughy state, and resembling carbuncle in no slight degree, Mr. Keate made a crucial incision into its substance. The bleeding which ensued was arrested by pressure with lint and a roller, but hæmorrhage took place every now and then, the surface became no cleaner, and on the 1st of January the whole of the breast was removed by amputation. An enlarged gland in the axilla, which the patient stated to have been there before the disease in the breast commenced, we rather think was left. The section of the amputated tumor of the breast shewed it to consist of the medullary sarcoma, run into ulceration on its surface.

The operation was followed by no very urgent or alarming symptoms, though nothing like healthy union or a speedy convalescence ensued. She continued to be harassed from time to time by attacks of vomiting, with much irritation and depression of the system; and on the 6th the parts around the wound were invaded by erysipelas. This attack was not severe, and speedily gave way to the bark and supporting system. On the 16th a large abscess was discovered to be forming in the right nates, and on the 26th it was opened, and a considerable quantity of pus discharged. By the 7th of February the wound on the chest was nearly healed, and she was made an out-

patient on the 18th, at her own particular request.

Previously to this she had complained of pain about the shoulders, and thickening and induration were but too apparent at the axillary margin of the pectoral muscle on the amputated side. Need we say that the prognosis was gloomy in the extreme?

On the 1st of April she re-applied for admission, in a melancholy condition. In the interval between the date of her leaving the house and that of her re-entering it, tumors, apparently malignant, had formed upon three different parts of the head. She complained of constant pain in that region, and the right side of the face was partially paralyzed. In the axilla, or its margins, several indurated tumors were felt, and one or two in the circatrix of the former wound.

It would be useless to particularize the treatment had recourse to, as not the slightest benefit ensued from its employment. She gradually sank into an apathetic state, with the mouth distorted, and more or less paralysis of many other parts: the tumors grew, but did not ulcerate, and in this miserable condition death at length put a period to her deplorable existence.

The rapid progress of the tumors on the head is a very remarkable circumstance, and, taken in connexion with the presence of the disease in the lungs and liver, serves to place in, unhappily, too broad a light the constitutional seat of medullary sarcoma. The case will also serve to shew how small the chance of success from amputation is, when performed after the tumor has gone into ulceration.

II. *Fracture of the Radius near the Wrist.—Dislocation backwards of these Bones at the Elbow.—Reduction at the end of 24 days.*

Andrew Kirkpatrick, ætatis 44, was admitted on the 29th of April, in a state of much depression, having just fallen from a scaffolding fourteen feet high.

The left radius was fractured near the wrist-joint, about which there was much extravasation. There was also a considerable lacerated wound on the dorsum of the hand, and a fracture of the scapular end of the right clavicle. The right arm was bound to the side with a pad in the axilla, and the left hand and fore-arm were laid prone in a hand-splint. A good deal of swelling and inflammation occurred in the limb, but these were subdued by appropriate means, which we need not stop to describe.

During the third week after the occurrence of the accident, the house-surgeon discovered that the olecranon and head of the radius were dislocated backwards, without a fracture of the lower end of the humerus. The mode of reduction now became the question, as the fracture of the radius was by no means firmly united, and pre-

sented, as it appeared, an insurmountable obstacle to the employment of extension from the wrist.

On the 23d of the present month he was taken into the operating theatre, the hand and lower part of the fore-arm lying rolled in a wooden hand-splint, and reduction attempted in the following manner.

The patient being seated on a chair, a folded jack-towel was slipped round the upper arm, and held by assistants standing on the left side of the patient. A folded towel was slipped round the fore-arm at the wrist, and held by an assistant standing behind the patient; his object was to flex the fore-arm on the arm. Mr. Brodie stood at the patient's left side, and the arm being held secure by one set of assistants, and the fore-arm steadily flexed by the other, Mr. B. pressed hard with his knee against the prominent olecranon, and at the same time drew the lower extremity of the humerus towards him with his hands. The attempt failed.

The fore-arm being kept firmly flexed, a towel was passed round it close to the elbow, and efforts made, by pulling upon it, to drag the bones down to their natural level. This plan was no more successful than the former.

A folded towel was passed round the upper arm, as in the first experiment, and committed to three assistants. Another rolled towel was hitched round the prominent olecranon, and also committed to three assistants. The former made the counter extension by pulling towards the left side; the latter the extension by pulling towards the right. At the same time, the fore-arm was well flexed by another gentleman. The extension, counter-extension, and flexion, were commenced. Mr. Brodie was manipulating the joint, when the extending towel fairly slipped from the prominent olecranon, and at that instant the reduction took place. Mr. Brodie believes that the flexion of the fore-arm was the chief agent in effecting it.

Δ.

GLOUCESTER INFIRMARY.

Notes on the Use of Iodine. By JOHN BARON, M.D. F.R.S.

A GIRL, about 15 years of age, came under my care in the Infirmary on the 5th of April, 1828. She was emaciated to the greatest degree; the abdomen was very much distended, and afforded a distinct sense of fluctuation. From the account which I received, I understood that the effusion into the abdominal cavity had been the consequence of an unsubdued attack of inflammation of the peritoneum.

I ordered the abdomen to be rubbed night and morning with an ointment containing hydriodate of potass. She was at the same time desired to take pills composed of blue

pill, gamboge, and extract of juniper; and a mixture containing infusion of digitalis, nitrate of potass, &c. The combined influence of these remedies was watched carefully for some time, but the pressure of the fluid within the abdomen was so great as to prevent absorption entirely. The urine became more and more scanty, the swelling increased, and the health of the patient was daily getting worse.

Under such circumstances, it was determined to remove the fluid by tapping. This was done. In a very short time the fluid began to collect again, and it rapidly increased, and, had it not been checked, the abdomen would soon have acquired its original bulk. In this state the iodine ointment was resumed; it was steadily employed for more than two months, and under its use the whole of the second effusion was absorbed. The only other remedies used during this time, were leeches to the anus, and a mixture containing extract of taraxacum, infusion of rhubarb, and sulphate of magnesia. No inconvenience whatever was suffered from the long-continued use of the iodine: on the contrary, the general health improved. After it was left off, she took sulphate of quinine twice a day, and occasionally an aperient pill. These latter remedies she used about six weeks. She left the house cured on the 13th Sept.

The next case I shall mention was more formidable in its aspect. The man was about 35 years of age; he had been a very intemperate liver. He was brought into the Infirmary in a state of the utmost exhaustion and emaciation; his respiration impeded, his abdomen tumid, his extremities livid, his tongue of a florid red colour, his appetite gone, and he frequently discharged blood from the mouth, throat, and (I believe) the stomach. He had been tapped once before he came under my care. My first object was to endeavour to improve his general health; to restrain the discharge of blood, and to act on the kidneys. I soon found, however, that little benefit was to be looked for in these respects, while the abdomen continued as it was. He was, therefore, tapped, and a very large quantity of serum was withdrawn. After this operation, an enlarged and hardened liver was very perceptible both to the touch and sight. I then recommenced what had been previously adopted without benefit, I mean the use of the iodine ointment, and a mixture with sulphate of potass and extract of taraxacum, together with nitrate of potass and infusion of rhubarb. To these remedies were afterwards added some blue-pill, with squill-pill and extract of conium. The treatment of the complaint was chiefly conducted by these means, with occasional variations, all of which I need not specify. It is necessary, however, to remark, that the abdomen filled very soon after the second tapping. Under the remedies above-men-

tioned, absorption began to take place, together with a manifest improvement in the nutritive process. His appetite amended, and he began to acquire flesh. While under my care, he had two attacks of peritoneal inflammation, during which the swelling of the abdomen increased. In both instances it was necessary to have recourse to the lancet. This man, from first to last, was about eight months in the Infirmary. Before he went out, the ascites was completely removed; the enlargement of the liver was much reduced; and, with the exception of this circumstance, and some slight œdema of the lower extremities, there was no trace of his former disease. The patient thought himself quite well, and left the house contrary to my wishes. I was anxious that he should continue the use of remedies which had been so efficient, in the full expectation that the remaining affection of the liver, and the swelling of the feet, would have been altogether removed.

Both the above cases belong to an intractable class of diseases, and I need scarcely add, that we are often foiled in promoting absorption from the abdominal cavity, after we have been compelled to have recourse to tapping. Nothing could have been more unfavourable than the last case, and the restoration was far more complete than I had anticipated.

Allow me, now, to select two other cases, in which the most gratifying success has arisen from the use of the iodine. One was that of a female nearly forty years old. A tumor about the size of a child's head occupied the lower portion of the abdomen, and pressed on the pelvic viscera. Neither the fæces nor urine could be discharged without the greatest difficulty. It was so great as to require the frequent use of the rectum-bougie, as well as of the catheter. Besides these means of temporary relief, leeches to the anus, anodynes, fomentations, &c. were occasionally had recourse to. The iodine ointment was, in addition, assiduously employed. Towards the conclusion of the treatment, I directed the patient to take a solution of the chloride of lime; prior to its use, a decrease in the size of the tumor was rendered manifest, on examination, as well as by less frequent need for the bougie. This patient was under treatment in the Infirmary for many months. The disorganization, I am happy to say, has been so completely removed, that no trace of it can be felt externally, and all the inconvenience and pain which she suffered from it have nearly disappeared.

I have lately treated another case, of the same description as the preceding. The disease had, however, made greater progress. The tumors not only pressed upon the pelvic viscera, and impeded their functions; they likewise expanded into the abdomen, and produced all the distress consequent on

this sort of disorganization. It was manifestly composed of different textures; some portions being hard, and others soft; and the surface of the abdomen affording that unevenness which denotes the origin and the character of the disease. In this case, the distress arising from the pressure of the tumor upon the bladder was so great, that it was necessary to employ the catheter every day. Under these unpromising circumstances, the use of the medicine of which I have been speaking was begun. It was employed both internally and externally for a considerable time. The result has been a great reduction of the tumor, complete freedom of the urinary organs, and such an improvement in the health of the patient as to permit her to perform the arduous duties of an active situation with ease.

GLASGOW ROYAL INFIRMARY.

Fungus of Testicle.

WM. MORRISON, aged 24, a stout healthy man, a native of the Isle of Skye, was admitted 16th August. The scrotum was nearly three times the size of the fist, thickened, and of a dark red colour. Both testes felt hard and enlarged, particularly the left. The upper end of the right protruded through an opening on the fore part of the scrotum, presenting a smooth, round, insensible excrescence, larger than a walnut. The integuments around its base were puckered and adherent. This had originated in an attack of hernia humoralis of both sides, after gonorrhœa two years before. About nine weeks prior to admission, the integuments ulcerated, and shortly after the fungus spouted from the aperture. The urethra was free. There was an eruption of papulæ over his forehead, back, and arms.

As the above affection seemed connected with a syphilitic taint in the constitution, he was ordered, on admission, three mercury pills, and *℞ i. decoct. Sarsæ.* daily. In the course of a fortnight, on his mouth becoming affected, the swelling of the scrotum had in a great measure disappeared, so that the state of the testes could now be ascertained. The left was soft, and twice its natural size, while the right, on the other hand, was rather shrunk. The eruption had also entirely vanished. Simple pressure, by means of compress and plaister, was now used, and continued for the space of a week, without effecting the slightest change. On the 7th September, the fungus was cut off on a level with the surrounding skin, the edges of which were pared, and an attempt made to bring them together by straps. No benefit accrued from this treatment, as a new growth sprouted forth to its former extent in the course of a few days. Graduated pressure was again had recourse to ineffectually. Between the 16th September and 15th October, excision of the fungus was

performed six different times on a level with the scrotum, the lunar caustic or actual cautery being freely applied to the bleeding surface after each excision. Nevertheless, the fungus always shot out to its former size, immediately on the slough separating. During this period, the mercury was twice repeated, and firm pressure used. The disease presented much the same appearance on the 20th October that it had done a fortnight after admission; and as the patient now wished to have the testicle removed previous to returning home, I accordingly performed the operation of castration on the following day. On examination, the fungus was found to originate from the body of the testis, being in reality a protrusion of its very substance, as was evident by the remains of the tubuli seminiferi being prolonged to the surface of the diseased mass. The testis itself was rather hard and shrivelled. At the upper part of the epididymis there was a cyst containing a trifling quantity of serum.

The wound of the scrotum united by the first intention. Inflammation and abscess, however, took place on the 5th day, along the track of the spermatic canal, requiring local and general bleeding, fomentations, &c. Of this he recovered, and was dismissed cured in the course of a few weeks. The left testicle sensibly diminished in size from the period of the operation, and, on his leaving the house, was not much larger than natural.

Nævus maternus cured by Vaccination.

Catherine Strathern, eight months old, was brought to the Hospital in the month of September, having a nævus on the lower part of the forehead, half an inch above the left inner canthus. It was as large as a hazel nut, and of a dark red colour. It was observed at birth, and was then quite level with the surface. After a month it became elevated. Having never been vaccinated, fresh lymph was inserted, by minute punctures, both around the circumference and over the whole extent of the tumor. On the 8th day many small pustules were visible, and by the 12th they had coalesced, and become incrustated. On the 21st the scab separated, leaving the surface underneath tender and slightly prominent. A second crust succeeded, and to this a third and a fourth; a perfect cure being effected in about six weeks.

I perfectly agree with those who have made trial of this practice, that it is indispensable to the ultimate success of the case, that the lymph should be freely introduced over the diseased surface, as well as around its circumference. In this way, the adhesive inflammation which is excited appears to extend from one pustule to another, and in the course of a few days the whole becomes involved in one scab.

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SATURDAY, JUNE 13, 1829.

ON THE
STRUCTURE AND PATHOLOGY OF
THE OVARIA, WITH THE TREAT-
MENT OF THEIR DISEASES.

*Being the Substance of the Gulstonian Lectures,
delivered before the College of Physicians,
May 1829.*

BY EDWARD SEYMOUR, M.D.
Physician to St. George's Hospital.

LECTURE III.

[Concluded from page 6.]

HAVING now spoken of the efficacy and *modus operandi* of the remedies believed to be effectual in the cure of this disease, I proceed to mention the palliative treatment, which is principally derived from the cautious use of bleeding, purgatives, opiates, and the operation of paracentesis.

It is obvious that the sweeping objection which would preclude blood-letting in this disease, must have arisen from misunderstanding the pathology. When rapid growth is proceeding, when there is a quick pulse, hot skin, and acute pain in the part, it is obvious that inflammatory action is going on within the cyst, and will probably eventually be propagated to the neighbouring peritoneum; and there is certainly no disease in which, under such circumstances, the use of the lancet is attended with more benefit. Even when great depression of vital power has apparently existed, the relief obtained has been very great, and similar to what is experienced in inflammation of an acute nature, when seated in other serous membranes. The pulse has risen in force and diminished in frequency under the flow of blood. It is in such cases that mercury is useful,

and, as in other inflammatory diseases, these remedies appear nearly similar in their effect, one diminishing the other altering vascular action. The comfort experienced after such loss of blood, by the administration of opium, is certainly equal, if not greater, to that which occurs in inflammation affecting vital organs, and seems to realize the feeling and almost poetic expression of the late Dr. Currie, of Liverpool—"The patient sinks into a sleep, which is ill exchanged for the realities of life."

Purgatives appear to be principally useful by keeping the bowels free from obstruction, and likewise expelling flatus, which is one of the most frequent and most painful symptoms attending the disease. The purgative so much used by the late Dr. Beddoes, consisting of jalap, cream of tartar, and ginger, appears very fully to fulfil this indication. It is quite evident that this class of remedies can never effect a cure, and, if very severe in their action, might cause the rupture of the cyst, and the probable death of the patient.

Under the most favourable circumstances, however, the fluid will continue to be secreted with great rapidity where the largest portion of the tumor is not solid, and the operation of tapping must be had recourse to. The first time this operation becomes necessary in this disease, has appeared, from ancient times, to have been regarded as very dangerous, probably from the fluid re-collecting so rapidly as to menace the life of the patient, even where no immediate bad effects resulted from its employment. It appears to have always been the great object of physicians to protract the period before it was had recourse to.

Morgagni, in speaking of paracentesis, delivers in very strong terms both the opinions of his contemporaries and his own against the operation:—

“Certe autem junior Verneyus, Chirurgus, siquis alius, in paracentesi exercitatissimus, disertè negat se ullam quæ saccato hydrope teneretur, vidisse saratam, quin plures, quæ satis bene valentes, nullaque alia nisi onerosi ventris, molestia pressæ, cum ab hac per eductam aquam liberare se vellent, brevi ait, periisse diu cæteroquin imo interdum diutissimè, ut sæpe indicata exempla ostendunt, victuras; sed et alii passim viderunt, paracentesim in his morbis citam mortem esse consecutam.”

And again—

“Mitto cætera; nam vel ex hiscejam satis, superque intelligis cur hic paracentesis non modo inutilis; sed et noxia miseræ mulieri contingat.”

Dr. Mead also appears to have greatly feared the application of this means of relief, as we have seen in a former case that a patient was relieved by a rupture at the umbilicus of the fluid which he thought it imprudent to relieve by tapping.

On the contrary, persons have been tapped very many times, and life been protracted many years; and probably in this, as in many other cases, it is desirable to avoid extremes—not to have recourse to the operation earlier than appears necessary on the one hand, nor to let the patient languish in unendurable distention on the other, from a vain fear, which at last may not be realized, of the rapid re-collection of the fluid.

The danger which often resulted from this operation, and the almost certain and rapid re-collection of the fluid, have induced medical men for many years past to seek for and recommend operations tending to a more perfect and radical cure. Such points of practice have been allotted (in this country at least) to a distinct branch of our profession, and nothing can be farther from my intention, in the view I am about to lay before you, than any interference with their duties. But it not unfrequently happens that such means are discussed in cases in which the physician is attending, and not to be acquainted with the points of difficulty or eligibility of such important practice would expose our patient often to hasty conclusions, and ourselves almost always to the imputation of negligence or ignorance.

Three methods have been proposed then for emptying the cyst, and for promoting its entire contraction, or for its extirpation.

1. A considerable incision, in order to empty the cyst entirely of its contents, leaving in a canula or bougie, in order to excite contraction of the cyst, and prevent the re-collection of fluid.

2. Injections into the cyst.

3. The extirpation of the whole ovarium.

For the first method of practice it has been urged, that operations on the abdomen, although dangerous, are by no means fatal; and the cyst often containing matters of various tenacity, will not escape through an ordinary canula.

A very remarkable instance of the application of this practice, and a very strong proof of the impunity with which operations conducted with considerable roughness may sometimes be successful, is contained in the 33d vol. of the Philosophical Transactions, by Dr. Houstoun, more than a century ago. This was the case in a woman, æt. 58, of an ovarian tumor of 13 years duration. I subjoin the account of the operation in his own words:—

“The operation of puncturing the abdomen being proposed, she consented. Accordingly, with an imposthume lancet, I laid open about an inch; but finding nothing issue, I enlarged it two inches, and even then came nothing forth but a little thin yellowish serum, so I ventured to lay it open about two inches more. I was not a little startled, after so large an aperture, to find only a glutinous substance bung up the orifice. The difficulty was, however, to remove it. I tried my probe, and endeavoured with my fingers, but all in vain; it was so slippery that it eluded every touch, and the strongest hold I could take.

“I wanted in this place almost every thing necessary, but bethought of a very odd instrument, yet as good as the best in its consequence, because it answered the end proposed. I took a strong fir splinter, such as the poor in that country use to burn instead of candles; I wrapped about the end of the splinter some loose lint, and thrust it into the wound; and by turning and winding it, I drew out above two yards in length of a substance thicker than jelly, or rather like glue fresh made and hung out to dry; its breadth was

about ten inches. This was followed by nine full quarts of such matter as is met with in steatomatous and attheromatous tumors, with several hydatids, of various sizes, containing a yellowish serum, the least of them larger than an orange, with several large pieces of membranes, which seemed to be parts of the distended ovary. I then squeezed out all I could, and stitched up the wound in three places."

This patient recovered, and lived fourteen years afterwards without any return of the disease.

The next time we meet with an account of a similar operation is in a memoir of the Royal Academy of Surgery in Paris; in which M. Le Dran states the result of two cases in which he made an incision into the tumor, and left in the canula; through which he injected the cyst with very mild washes, as barley water and a little honey, &c.

The first was the case of a lady, æt. 60 years, who had been tapped twice, but the fluid rapidly re-collected. He performed the operation, extracted the contents, fluid, and membranous substances, and nearly closed the wound, leaving in a canula, through which injections were made morning and evening.

The patient survived the operation four years; having, however, a fistulous communication in the abdomen with the sac, which opening never actually closed.

The second, an unmarried woman, æt. 42, had a similar operation performed; the canula left in; and at the expiration of two years the fistulous opening closed, and the patient entirely recovered.

These occurrences have naturally led in modern times to a repetition of the operation. Injecting moderately stimulating fluid into the cyst, although it has the analogy of the cure of hydrocele in its favour, does not succeed; and, indeed, unless the quantity of inflammatory action could be accurately measured, it seems to induce the most fatal conclusion of these diseases.

Leaving in the canula, or a bougie, after paracentesis, has been frequently tried. I am indebted to my friend Mr. Key, senior surgeon to Guy's hospital, for a note of three cases in which he employed this practice; and as it has failed in the hands of this scientific and accomplished surgeon, I fear it is

not likely ever to be attended with the success which would establish its utility.

"I find notes of three cases in which the instrument was left in after tapping an encysted dropsy. The issue has not been such as to lead me to expect much from the plan. One case was favorable for the treatment, as the fluid was of the serous character. The two others contained a fluid of much thicker consistence; in one it resembled mucilage, in the other a dark coffee-ground fluid. A strong and otherwise healthy woman, æt. 42, single. Dropsy of four years standing. Twenty-seven pints drawn off, resembling straw-coloured serum; no inflammation followed. In two months fluid again collected; tapped; and twenty-one pints of same character removed. A piece of elastic gum catheter left in, but closed; for three days pain, but not considerable; slight febrile symptoms on the third day; plug withdrawn, and a few ounces of turbid serum removed. Experienced relief. The same operation repeated on the 9th, 13th, and 18th of May. At each successive operation the fluid assumed a more turbid and inspissated character, shewing the progress of inflammation. At the last she began to complain of so much general tenderness, and so much fever excited, that I was induced to comply with her request to withdraw it. The treatment certainly retarded the formation of fluid, for I had not occasion to tap her until six months afterwards, when the fluid was found to be of the serous kind, containing a few flakes of lymph. The medical treatment consisted in mild purgative remedies.

"The second case is that of a female, æt. 33, having had ovarian dropsy for two years and a half; the tumor solid in some parts, with a large cyst on right side; the health impaired of late as the tumor increased. The bougie was introduced after tapping; the fluid drawn off was of the mucilaginous kind, of a light brown color. On third day she complained of great pain across the scrobic. cordis, which was relieved by fomentations. On fifth day, pain returning, with sickness and a febrile pulse, thought advisable to take out bougie. The fluid again collected after a short interval, and was removed; it retained the same character. This patient died out of the hospital in a year after; and, on inspection, the ovarian

tumor was divided into several cysts, of various sizes, with tense fibrous septa.

“The other case was a delicate young married woman, without children, exceedingly florid complexion, and of but little constitutional power. The fluid was of a dark reddish coffee-ground color, about seventeen pints in quantity. A piece of elastic catheter left in; obliged to be withdrawn on the following day, in consequence of the severe constitutional irritation that followed. The fever and tenderness of the belly increased for four days, and an abscess formed between the peritoneum and integuments, which burst at the opening made by the trochar. Under the continued suppuration she sunk; and not being allowed to inspect her, we could not ascertain if the abscess communicated with the cyst; of this, however, we had strong suspicion.”

The third measure for the cure of this disease, and of which in modern days we have heard much, is the extirpation of the whole tumor. In the unimpregnated animal the extirpation of this organ, it is well known, is attended with little or no danger. In some cases, likewise of hernia, as in the celebrated one of Mr. Pott, quoted on a former occasion, the ovaria have been removed without any other evil result than that of barrenness.

It is said, indeed, but we would fain hope that such accounts are entirely false, that both in ancient and modern times the extirpation of this organ has taken place to gratify the cruel and barbarous profligacy of Asiatic monarchs. Such reasoning has led to the recommendation of a similar operation when the disease of the organ has attained a size which leaves little other hope of relief by human art. It has been recently successfully performed several times on the Continent, and in our own country by Mr. Lizars, of Edinburgh. Nevertheless, the probabilities of success are very small. If the tumor be not large, and the woman's health unbroken, she may live many years, as long as is allotted to humanity, in the enjoyment of a tolerable existence. If the health be much broken, the cure of so large a wound in a weakened constitution would be difficult, if not in the great majority of cases impossible. If connected with scirrhus in other parts of the body, it is inadmissible; and if the growth itself be of the nature of

fungus hæmatodes, all experience tells us that should the operation be survived, or the wound heal, the disease will recur in other vital organs of the body.

Nor do the difficulties rest here: when these growths enlarge to a great size they most frequently adhere, and here the operation is out of the question. If all these exceptions, then, are estimated, the case which remains in which such a risk is advisable, and such an operation feasible with any fair chance of a happy result, is rare indeed. Still the meed of praise cannot be withheld from those men who have dared and been successful.

I have now laid before the College, as far as my limited time would permit, the leading points of this interesting inquiry; and have endeavoured to propose a plan for farther investigation of these diseases, beginning with the alterations of natural structure, and tracing them to the more complicated forms of disorganization.

Of the importance of the subject, and the imperfection of its execution, none can be more conscious than myself; I seek only for the merit which is to be derived from the nature of the subject, and the labor necessary for its elucidation.

Before concluding, I ought to return my thanks to those professional friends who have assisted me with their opinions, and the loan of many rare and valuable preparations; and it is only acknowledging a debt when I mention how much I am obliged to Mr. Oswald Cooper and Mr. Smith, who assisted me in the dissections; and to the former especially, who put up the beautiful preparations of comparative anatomy which I had the honor of laying before you at the first lecture, and which are now deposited in the museum of the College.

HÆMORRHAGE FROM THE BOWELS.

To the Editors of the London Medical Gazette.

GENTLEMEN,

SHOULD you consider the enclosed remarks on alvine hæmorrhages worthy of insertion in your valuable publication,

you will oblige me by giving them a place therein as early as convenient.

I remain, Gentlemen,

Your obedient humble servant,

WILLIAM ILOTT.

Bromley, Kent, May 31st, 1829.

The occurrence of hæmorrhage from the bowels in the progress, or at the termination of fevers, although noticed by various authors from the earliest times, does not appear to me have received that degree of investigation which its interest and importance demand. The principal authors of former times whom I have consulted on this subject, are Hippocrates, Sydenham, and Huxham. Hippocrates usually speaks of hæmorrhages in such general terms that it is not easy to discover to which species his observations apply: he appears to me to have always attached more importance to the circumstances connected with the discharge than to the part from whence it came.

Discharges of black blood, per anum, are by Sydenham and Huxham classed along with petechiæ and vibices, and attributed to a putrid state of the fluids. I do not remember that their works contain any separate remarks upon alvine hæmorrhages. Passing by the writings of Dr. Cullen, and referring to authors more immediately of our own times, the same want of classification appears to pervade their works. Dr. Clutterbuck, both in his writings and lectures, speaks of these discharges as occurring in the last stage of fever, together with petechiæ; and although he does not give any specific opinion on the subject, he ranks them among those symptoms which others have attributed to a putrid state of the blood.

In Dr. Armstrong's valuable work on fever, there is a nearer approach made to a classification of these hæmorrhages, according to different circumstances. At page 117, when speaking of typhus fever, he says, "on the approach of the last stage frequent, copious, black, bloody stools are passed, without any offensive odour. About the same time, too, peculiar petechiæ begin to shew themselves upon the extremities, which at first are only few in number, and appear as if a drop of very black ink had been allowed to dry here and there upon the skin, and as if they could be almost rubbed off by the fingers; but they soon become more numerous, and

spread over different parts of the body, and at last are generally accompanied by discharges of blood from the nostrils, mouth, bladder, or bowels." His opinion of the essential nature of these cases does not appear to differ materially from that of former authors. At page 53, however, are some observations more to my present purpose. When speaking of the conclusion of certain cases, complicated with inflammation of the mucous membrane of the bowels, he says, "considerable quantities of blood are sometimes passed by the rectum, which rapidly sink the strength;" and further on, "though at the same time it ought to be remarked that similar eruptions may proceed from the liver, as has been ably illustrated by my friend Dr. Ayre." On reference to the work of Dr. Ayre, on bilious disorders, it appears that the alvine hæmorrhages he speaks of are not connected with fever; and it is to be regretted that Dr. Armstrong has not treated the subject more at length, and told us whether any, and if so, what kind of hæmorrhages from the liver are connected with typhus fever; and thus enabled us to distinguish them from those which are complicated with inflammation of the mucous membrane of the intestines. It is not my present purpose to notice those alvine hæmorrhages which are accompanied by petechiæ, because I have seldom met with them, and because I believe they now rarely occur to any one, a circumstance probably to be attributed to the improved plan of treatment; the credit of which may, I think, be equally divided between the two eminent writers to whose works on fever I have last alluded. In spite, however, of improvements in pathology and practice, alvine hæmorrhages still continue, at times, to embarrass and alarm the practitioner without the accompaniment of petechiæ, and even when the previous symptoms have been remarkably mild.

A physician, of great eminence and experience, informed me, three years since, that he had seen more of these cases in a few months than he had previously witnessed for many years; and he has lately told me that he thought this district had been remarkable for the frequent occurrence of these symptoms. By some physicians of eminence this occurrence has been considered as an universally fatal one; while by others

it has been considered as favorable. I know a private practitioner, in the country, who had always been of the former opinion; but from having witnessed three or four cases, which ended well, he has become a convert to the latter. This discrepancy alone is sufficient to convince us that a classification of these discharges is a desideratum in medical practice. From repeated experience, I am convinced that there are two distinct species of alvine hæmorrhage which occur in fever without petechiæ; that these species arise from totally different causes; that one is usually fatal, the other salutary; and that by a careful examination of all the circumstances, the practitioner may give a tolerably correct prognosis in each case. I have waited, in expectation that the subject would be taken up by some one more able to do it justice; that hope has not, however, been realized; and I now proceed, without further preface, to give a succinct account of those hæmorrhages which may be generally said to indicate a fatal termination.

In no one instance have I seen this kind of hæmorrhage preceded by symptoms which would be considered unfavorable. The disease is generally the mildest form of typhus fever. Neither in the pulse, the tongue, nor the general state of the sensorial functions are there any signs of a severe disease. Nor do I recollect any evidence either of inflammatory action, or of faulty secretion on the part of the liver. There is generally a slight diarrhœa from the beginning; but it is unaccompanied by severe pain, mucous discharge, or tenesmus. After the fever has gone on in this way for an indefinite number of days, and before any thing like a crisis takes place, an increase of diarrhœa generally occurs in the night, and we then find that the stools are accompanied by a discharge of blood. On examining the motions, it is not usual to perceive any thing very wrong either in the colour or odour of the fæces; the blood is always passed along with, and mixed with the motions; it is seldom in large quantity, very rarely more than an ounce; it has almost always the appearance of arterial blood. No perceptible loss of strength, or alteration in the symptoms, takes place at first; the patient generally, however, complains of more severe head-ache and giddiness; but the practitioner, if not

used to the occurrence, would be induced to overlook the hæmorrhage, or to consider it as salutary, and direct his attention exclusively to symptoms he may deem of more importance. On his next visit, he perhaps finds that the bleeding has not recurred; but in spite of that he is now convinced that it is neither critical nor salutary, for the patient is in every respect worse; the symptoms of cerebral derangement are more decided; the head-ache is very severe, with delirium, and a total want of sleep in the night; the tongue is getting dry, and brown; there is a little sordes about the teeth; and although uncombined with hæmorrhage, the diarrhœa has rather increased. On the next visit we find that, besides the general symptoms being more strongly marked, the hæmorrhage has returned in the night, and in larger quantity; there is some degree of subsultus, and picking of the bed-clothes. In most cases actual convulsions take place, and each febrile paroxysm is sometimes ushered in by them. In one patient, a weakly female, 35 years of age, whose mind had suffered much, and whose strength had been much reduced by a severe mercurial course, prescribed for her in London, the case was complicated both with convulsions and symptoms of maniacal affection. It is probable that in this case there was disease of the liver. It is quite unnecessary to detail, step by step, the further progress of these distressing cases, because they never exhibit all the worst symptoms of typhus fever, and generally terminate fatally in a few days from the commencement of the hæmorrhage. Most of them sink into a state of coma, and die with all the symptoms of effusion on the brain. It is not unusual, however, for the hæmorrhage to cease altogether on the approach of the most malignant symptoms. Under these circumstances I have never known the hæmorrhage take place before the fifth day, nor later than the eleventh; neither have I known the patient sink in less than thirty-six hours, and then the hæmorrhage amounted to nearly half a pint at each discharge. Neither have I, more than once, known a patient survive the first occurrence of the hæmorrhage more than ten days. In that case the hæmorrhage ceased for a few days, but recurred in larger quantities, and the patient then sank rapidly. The above cases bear the greatest analogy to the

bloody flux of Sydenham, and the dysentery of the later pathologists. The greater quantity of blood, and the absence of all tenesmus, or mucous discharge, is, however, sufficient to distinguish them. These are evidently the discharges of blood alluded to by Dr. Armstrong at page 53 of his work on fever; and were it not for the purpose of contrasting this with the other species of hæmorrhage, I should not have presumed to give an account of what he has described so much better. I have never examined any of these cases after death; but I regret it the less, because it has been done by Dr. Armstrong. He tells us that the villous coat of the intestines will generally be found injected. It does not appear to me, however, that the simple existence of inflammatory action is sufficient to account for these discharges of blood without the co-existence or pre-existence of some depressing cause; and without supposing that a very destructive process, probably some degree of sloughing, has been produced by the violent inflammatory excitement. In most of the patients I have seen, there was either some depressing mental cause combined with the case, or there were evident symptoms of a want of tone in the system some time previously.

As to the treatment, my object has always been to support the strength of the patient by moderate quantities of wine and nourishment; and to endeavour to prevent a recurrence of the hæmorrhage by astringent medicines and injections. I have been led to do this, convinced that the discharge has not been critical, nor connected with any congestion about the liver. I have once seen bleeding resorted to in these cases to check the hæmorrhagic tendency, and relieve the head; but, instead of allaying, it aggravated the general symptoms. I have not been in the habit of giving mercurials after the commencement of the hæmorrhage, but in no single instance had the proper administration of those and other purgatives been previously neglected. Among astringents, I have used injections, containing alum and opium; and medicines, composed of kino, quinine in small doses, and opium. The sulphate of copper, also, and opium, have been given in combination. I cannot say, however, that I have found any treatment effectual in arresting the pro-

gressive effects of this kind of hæmorrhage.

I now proceed, by way of contrast, to give a short account of those alvine hæmorrhages which in my own experience have generally proved salutary and critical. They are commonly preceded, like the former, by a mild form of fever; there is not in general much appearance of cerebral derangement. The bowels are generally in a costive state from the beginning; and when this is the case there is some peculiarly distressing and pertinacious symptom, which forms the chief source of annoyance to the patient, and is never materially relieved by any curative means. In most cases, when combined with costiveness, I have found this to be an indescribable, unquenchable sensation of heat about the scrobiculus cordis. I have tried antacids of every kind, combined with purgatives, but have never found them even temporarily useful. I have also employed the lancet, but the relief obtained by the abstraction of blood has usually been of very short duration. In one or two of these cases the most urgent symptom has been a very obstinate and distressing diarrhœa, and then the heat at the pit of the stomach has not been felt. I have invariably examined the evacuations in these cases, and have never but once remarked that they showed either a deficiency or redundancy of the biliary secretion; in that single case the evacuations were very dark in appearance.

After the fever, accompanied by these pertinacious symptoms, has run on for a certain time, a sudden and very profuse hæmorrhage of black blood generally takes place in the evening of some critical day. I have known it occur on the seventh, fourteenth, and about the twenty-first; never earlier than the former, nor after the latter. This hæmorrhage is accompanied by much more prostration of strength, and excites more alarm than the one above described. It is not unusual for the patient to void have a chamber-pot full of black blood at once. The practitioner is sent for in haste; and generally finds the patient with a very pallid countenance, a feeble pulse, and cold extremities. If not accustomed to discriminate between these cases, he will generally pronounce a fatal prognosis. Although, however, I have no doubt these cases sometimes produce death, by the

sudden loss of so large a quantity of blood, after an enervating disease, I think I may venture to say that when it is critical this termination will not often take place. On coming to see the patient again, we find that there has been during the night a second, and perhaps a third profuse discharge of black blood, followed probably by a tolerably healthy stool, consisting of feculent matter, without blood. We rejoice, too, to find that although much reduced, the patient has got rid of those most obstinate and distressing feelings which formed his chief annoyance. If heat at the stomach had been present, it is felt no longer; if diarrhœa, the bowels act in the usual manner. I have only to add, that the patients in these cases, if the strength is supported by wine and nourishing diet, generally experience after the hæmorrhage a speedy recovery.

I have heard of cases resembling the above having terminated fatally from the suddenness and profuseness of the discharge, and this undoubtedly may take place. I can, however, affirm that when unaccompanied by petechiæ, and occurring as a crisis in the disorder, I have never yet witnessed a fatal termination in these cases. I have stated above, that the fever preceding this hæmorrhage is generally mild; and this leads me to observe, that it may be doubted by some whether these are cases of fever. The only diseases resembling them are those of melœna, and hæmorrhoidal discharges. It is difficult to prove the non-existence of internal piles; but I can affirm that piles were not present in these cases outwardly; and supposing the discharge to take place from the hæmorrhoidal vessels, I will venture to say that no pathologist would, in these cases, have called the disease by any other name than that of idiopathic fever, previously to the occurrence of the hæmorrhage. The same may be said in answer to those who would identify these cases with melœna. To shew, however, the distinction, I will give the outline of a single case, and that the last which I have seen. This patient had been ill for a week before I saw her, and had been removed from a neighbouring village, where fever was prevalent. She had considerable confusion of ideas, without actual delirium; tinnitus aurium, and partial deafness. There was

also much prostration of strength, and the patient lay stretched at full length in the bed, in a very supine position. The tongue was not furred, but glossy and dry; the pulse not remarkably full or strong; the skin not very hot; there were regular morning remissions, and evening exacerbations. The most obstinate symptom was constant diarrhœa, but more profuse during the night; the motions were nearly of a natural colour. These symptoms continued without abatement till the evening of the fourteenth day, when a very profuse hæmorrhage of black blood took place per anum. The patient was at first much reduced. I ventured, however, to pronounce a favorable prognosis; and she experienced a very speedy recovery, having no return of either fever or diarrhœa. It is only necessary to contrast the above case with one selected from among Dr. Ayre's cases of melœna and hæmatemesis, to perceive the striking difference. There was no pain about the hepatic region; no vomiting of bilious matter; no fainting, or cold perspirations; no discharge of blood from the stomach; but a simple case of typhus fever, terminating in a profuse discharge of blood. This case, in its general outline, closely resembles all the rest which I have classed under this head. They have all taken place during the prevalence of vernal or autumnal fevers; and in most of them fever has even been present at the time in the family of the individual. It is impossible, therefore, to identify these with common cases of melœna and hæmatemesis. In Dr. Bateman's work on fever there is a case very much resembling those I have sketched above. It occurs at page 67, and is cited by Dr. Bateman as the only case in which he could fairly infer the existence of hepatic congestion. The only difference is, that the accompanying fever was rather more severe. The relief experienced by the hæmorrhage was as decided, and the cure equally speedy.

The only rational explanation of the phenomena in these cases of fever is, that the hæmorrhage takes place from either the vena portæ or the hæmorrhoidal vessels; and that it is an effort of nature, and certainly a very effectual one, to relieve the febrile excitement. As such, when it takes place precisely under these circumstances, it may be classed with the epistaxis, and be con-

sidered as almost equally harmless. It appears probable that those cases where the great heat at the stomach has prevailed, and the bowels are costive, have been relieved by a discharge of blood from the vena portæ, whereas those combined with diarrhœa have terminated in a copious gush of blood from the hæmorrhoidal veins. As to treatment, when once the hæmorrhage has occurred, the disease is usually cured; and nothing further is necessary than to keep up the patient's strength. I have, however, generally given injections of alum if the hæmorrhage recurred; and should certainly, wherever such an event was anticipated by the nature of the previous symptoms, use the lancet freely.

After having, therefore, attentively weighed the above cases in my mind, I think I may fairly come to the following conclusion; that there are, besides those connected with petechiæ, two kinds of hæmorrhage from the bowels in fevers. One of these will commonly prove fatal, and the other is more frequently salutary. The former will take place at no particular period of the disease; will not be very profuse, but recur at intervals; will take place along with the stools, and consist chiefly of arterial-looking blood. That, in spite of the small quantity of blood lost, this will generally produce a fatal termination, or lead to a very protracted case of fever. The other hæmorrhages, on the contrary, will take place on some critical day; will be preceded by some peculiarly distressing symptom, which will disappear on its occurrence; it will consist chiefly of venous blood, in a very large quantity, the whole of which will pass in the course of one night. It will not return after this; and the patient, although much reduced at first, will experience a speedy recovery. It is not intended by these remarks to assume that these cases are new to the profession. The first have been already described by Dr. Armstrong in his work on fever; the latter, however, have not received much notice from him; and they are only recorded here to shew the advantages that may result from a careful examination of the distinguishing features in each. Next to the power of curing diseases, I have always been accustomed to value a correct prognosis; because, by this means, we avoid,

on the one hand, the creation of unnecessary alarm, and, on the other, the raising of hopes, which subsequent events may convert into disappointment and sorrow.

ON OSTEO-SARCOMA.

BY GEORGE GULLIVER,

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THE term osteo-sarcoma has been indiscriminately applied to several distinct affections of the osseous tissue, without reference to their specific nature, or to the structure in which they originate. I therefore propose to describe the pathology of this malady, and to consider subsequently the structure of those tumors with which it is so commonly confounded. This is not merely a piece of anatomical refinement, but a matter intimately connected with the practice of surgery.

By the generality of English pathologists, all tumors made up partly of bone, and partly of soft parts, have been included under the general appellation of osteo-sarcoma, in conformity to the etymological import of the word. Many of these tumors commence in different tissues, and we shall see how much they differ among themselves.

Some eminent continental surgeons, especially Boyer and Callison, imply, by osteo-sarcoma, a degeneration of the bony tissue into a substance more or less analogous to cancer of soft parts. I apprehend it is precisely the same affection to which Dr. Cumin proposes to limit the term, without, however, involving an opinion as to the cancerous nature of the disease. Much ambiguity would therefore be avoided by dispensing with a strict attention to the etymological meaning of the word, and confining its application exclusively to a malignant disease of bone commencing in the membrane of the cancelli, and speedily leading to destruction of the osseous substance, and to the growth of an exuberant fleshy fungus, of variable consistence. This form of disease possesses well marked characters, and a section of the tumor immediately manifests its specific structure. In distinguishing it, we may, therefore, altogether dispense with any reference as to

its original seat, for the condition presented by the morbid growth is as uniform, and as easily recognizable, as that of other tumors.

Sir A. Cooper has given an admirable account of this disease under the head of *Fungous Exostosis of the medullary membrane*. I subjoin a description of it from numerous dissections, and from preparations made by myself for the museum of the army medical department, an institution which will one day prove as useful to science as it is creditable to the liberal and extensive views of its founder and patron.

The subjects of this cruel malady are generally of debilitated frame, and cadaverous complexion, especially in the advanced stage of the disorder. All the bones seem to be indiscriminately liable to it, particularly those of the pelvis. It first simply distends the surrounding soft parts, but these are at length involved in the destructive progress of the disease; and if it occurs towards the extremity of a long bone, the articular cartilage is quickly destroyed. The first trace of the disease is discoverable by inflammation of the medullary membrane; the usual healthy secretion of which is removed, and speedily replaced by a highly vascular fungus. The bony parietes now begin to participate in the morbid action; they are absorbed and replaced so as to form a greater space internally, thus appearing to have suffered partial distention; the bony tissue acquires preternatural softness, so as to be easily cut with a knife; and if it be treated in this stage by maceration, it will be found to be extremely light, and to present very considerable extension of the cancellous structure. As the disease increases, the contiguous walls of the bone are superseded by the fungoid growth, which elevates the periosteum, and is thus included between it and the medullary cavity. At this period abundant osseous spiculæ shoot from the neighbouring bone into the soft vascular fleshy structure, but these are less numerous in the more advanced stage of the complaint. If a section be now made of the morbid growth, it is found to be composed of various parts; but a vascular structure, of soft fleshy texture, is the most abundant; this has sometimes a yellowish tinge, at others it inclines more to a white color, when it is generally of firmer consistence:

there are often cells filled with gelatinous matter and coagulated blood; and the numerous bony spiculæ by which the substance of the tumor is pervaded, afford but little resistance to the passage of the knife. The contiguous bone undergoes much interstitial absorption, and sometimes a thin reticular expansion surrounds the swelling. Maceration destroys the soft parts of the tumor, and thus affords us an opportunity of exhibiting the ravages of the disease; and a very delicate fabric of osseous spiculæ, arranged like frost-work, is thus separated from a vast gap in the parent bone. As the tumor acquires magnitude, it assumes a tubercular appearance on the surface; constant pains set in, which are not materially increased by pressure. The tumor, when situated in the neighbourhood of a large artery, not unfrequently acquires considerable pulsation. The surrounding soft parts do not become diseased till a late period, when they are much stretched by the increase of the adventitious structure; and at length become inflamed, ulcerated, and sometimes sloughy, when much hæmorrhage often occurs. The patient is rapidly emaciated, and sinks after protracted suffering. I was afforded unusual facilities of investigating the disease by dissection in the following case, which I had an opportunity of observing some years ago, and which I select from several others, of which I possess notes, as it well illustrates some remarkable circumstances in the early pathology of the affection.

A young man, æt. 23, of delicate appearance, had complained for upwards of a year of deep-seated pains of the bones. He had also suffered from dysentery and hepatic disease. The pains were generally exacerbated at night, and were considered to result from rheumatic affection till tumors appeared on the ribs, and ala ilii; these were of tolerably firm consistence, and produced no discoloration of the investing integuments; and although the patient experienced much pain, it was not materially increased by pressure on the swellings, which soon became irregularly tuberculated on the surface. The countenance of the patient assumed the hippocratic aspect, and rapid emaciation commenced; he was reduced to the last degree of weakness, and consequently became bed-ridden. Hectic

fever now supervened, and he suffered much from pain and want of rest; the appetite altogether failed, and his dissolution took place after he had been nearly four months in hospital.

The body was examined 36 hours after death. A tumor, about the size of a hen's egg, projected from the two first ribs of the left side; the swelling involved the whole circumference of the bones, and was equally developed in every direction; it had commenced separately in the two ribs, but was united in the interspace, so as to form but one distinct mass. Several other tumors, of less magnitude, presented on many of the ribs, which suffered fracture in the situation of the disease by the application of the least violence. The bones of the pelvis were pervaded by similar growths; the ossa ilii, sacrum, right ischium, pubes, and the last lumbar vertebræ, being all involved. On the left side the disease extended into the cavity of the hip-joint, destroying a great part of the acetabulum and the articular cartilage. On making various sections of the tumors, the very smallest were found merely to present thickening, with the highest vascularity of the medullary membrane, the cancelli being loaded with bloody serum. In those more advanced, the bony parietes appeared to have suffered expansion, and the cavity was filled with the medullary membrane, which now assumed a fungoid character, and completely occupied the dilated cells of the bone. As the tumors increased in size, the osseous parietes were altogether removed, or merely formed a partial delicate reticular investment to the distempered mass, through which the knife passed with the greatest facility into the substance of the neighbouring bone, which had as yet undergone no alteration of form. The external covering of the tumor was formed by the periosteum. The section presented a smooth surface; and on examination with the finger many osseous spiculæ were discovered; it was of various colours, one part being of a light yellow hue and pulpy texture; another white, of firm fleshy consistence; and the whole was intermingled with small portions of extravasated blood, and little cavities, filled with grumous purulent matter and sanies.

Osteo-sarcoma has been regarded by Boyer, and other great authorities, as identical with cancer of soft parts.

Although the former affection, like cancer, almost uniformly pursues a destructive course, and may be considered to be essentially a malignant disease, yet I am by no means inclined to regard it as truly cancerous. I have seen one case of an osteo-sarcomatous tumor appearing on the right ilium of a woman affected with frightful carcinomatous disease of the mamma, but had no opportunity of learning the ultimate history of this patient; and Mr. Hind, of the London University, informs me that he recollects an instance of similar complication. The simultaneous appearance of several tumors in the case I have narrated, may appear to possess much affinity to carcinoma, but in nine other cases of osteo-sarcoma, of which I have preserved notes, not one exhibited any disease of the glandular structure at all allied to cancer, and the instances of the co-existence of this malady with osteo-sarcoma are rare; neither do the recorded examples of this latter disease in the older books of surgery, or those more lately published by Mr. John Bell and Sir A. Cooper, afford any instances of a complication of true osteo-sarcoma with cancer, for those cases of absorption of the solid substance of the bone, from the contiguity of disease of the soft parts, as in fungus hæmatodes and carcinoma, bear no relation to osteo-sarcoma.

It appears rather extraordinary that a disease of such marked characters, so formidable in its nature, and so uniformly destructive in its progress, should have been confounded by men of the greatest eminence with widely different affections, particularly under the appellation of fungus ossium, a term which has been indiscriminately applied, and indeed is equally applicable, to all anormal growths of osseous substance. Boyer considers fungoid disease of the antrum which leads to the destruction of the bony parietes, as one form of osteo-sarcoma; and it is the more surprising that he should thus confound so distinct a variety of the hæmatoid structure with the disease under consideration, as his description of osteo-sarcoma is otherwise remarkable for its accuracy. Meckel had identified it with mollities ossium and rickets; and Petit seems to have considered cellular extoses, osteo-sarcoma, and spina ventosa, but as so many varieties of caries. The animated descriptions of John Bell are indiscri-

minately grouped together under the general head of *Tumors of the Bones*; and his instructive cases afford no evidence of his having regarded the subject of the present article as a distinct affection, or as possessing any remarkable difference from the more common and less formidable cellular exostoses.

I purpose, at no distant period, to complete my design by following up in a summary manner the history of those diseases of the osseous tissue with which osteo-sarcoma has been confounded.

General Army Hospital,
Fort-Pitt, June 1st, 1829.

STRANGULATED HERNIA.

To the Editor of the London Medical Gazette.

Birmingham, June 2, 1829.

SIR,

MARY ANDERTON, aged 58 years, was admitted into this hospital about 8 o'clock on Tuesday morning, May 26th, labouring under strangulated femoral hernia. From her statement, it appeared that she had been the subject of hernia for five or six years, but that it had never materially inconvenienced her until the Saturday evening previously, when she found she could not return it. She called in surgical aid the same evening, but never mentioned the swelling until the evening of the next day. At this period the usual endeavours were employed to effect its reduction without avail, and though urged to seek admission into the hospital, she obstinately refused to listen to such advice until the time above named.

When summoned to see her, I found her labouring under great prostration of strength, with rather cold extremities. Pulse regular, though slow. She had had vomiting several times since her admission—most decidedly of a fœculent character. The abdomen was not tense, but the intestines were loaded, and exhibited their configurations through the parietes. [This appearance, in my opinion, had no connexion with the hernia, as I have often observed it in elderly people]. The tumor was rather larger than in general, of an irregular shape, and its surface was discoloured and in-

flamed. Under these circumstances, and learning that rather forcible efforts had been made at various intervals previous to her admission, I deemed it highly expedient to summon a consultation immediately, and to proceed to the operation. I made a free longitudinal incision through the integuments, and speedily opened the sac; when I exposed a knuckle of intestine imbedded in omentum. The intestine was of a dark colour, and had those slight adhesions to portions of the sac which we so often meet with in post mortem examinations resulting from the effusion of lymph. I directed the fore-finger of my left hand to the point of stricture, which I found to be considerable; and with a probe-pointed bistoury, guarded to within a quarter of an inch of its point, I divided in a slight degree the stricture upwards and inwards. Finding, however, that I could not, without injury to the peritoneal coat of the bowel, return it, I preferred a free division, which I instantly effected; considering this of much less consequence than risking the bowel, which had already sustained sufficient mischief by its incarceration. I found no difficulty in replacing the intestine; and the omentum being less injured than the bowel, I replaced it likewise, and brought the parts together by suture. The pulse very sensibly rose after the operation, and the patient expressed herself much relieved by it. The disposition to sickness speedily subsided. In about half an hour after the operation the pulse averaged 84 beats, and was full and regular. After the lapse of an hour, for the purpose of allowing nature to rally, I ordered a strong soap clyster, with 15 grains of powdered aloes, to be thrown up the rectum. In two hours afterwards I visited her again; and finding the clyster had not operated, I gave her one drop of croton oil, and ordered her to have nothing but tea or thin gruel. Pulse 88, and she expresses herself to be very comfortable. In two hours I again visited her; and finding there had not been any satisfactory evacuation, I gave her two drops of croton oil with ten grains of the ext. coloc. with further direction, that if this did not operate by ten o'clock at night, to have a clyster of gruel, with thirty grains of the ext. coloc. comp. dissolved in it, administered. At half-past 10 o'clock I visited her again, and found her greatly re-

lieved, having had a copious liquid fœcal evacuation; and I left her, quite confident from her feelings that her bowels would be again acted upon in the night. Pulse 88, full and strong. No vomiting or sickness whatever. She complained of occasional twitchings in her bowels, which caused her to moan occasionally, but they were safely to be referred to the action of the medicine. Directed to continue her diluents during the night.

Wednesday morning, 27th inst.—Found her very comfortable. Pulse 84, full and regular. Has slept at intervals during the night; has had two full fœcal evacuations. Bowels much reduced in size, and in no wise tender excepting in the vicinity of the wound. Ordered to continue tea, thin mutton or veal broth, and not to take any more aperient medicine. Though she says she has had rather more uneasiness during the night in her bowels, the regularity of her pulse, and its fulness, and the suavity of her countenance, fully convinced me that such feelings were entirely to be attributed to the action of the aperient pills previously taken. In the afternoon I found that she has had five or six alvine evacuations since morning—less fetid; and the two last of good colour. Pulse 84. No medicine, but directed to continue the same diet as usual.

Thursday morning, May 28.—Found her quite easy and comfortable. Pulse 86. Examined and dressed the wound. The upper portion of it has united by the first intention: the inferior, slightly suppurating. The bowels not having been moved for the last sixteen hours, and the tongue being furred, I gave her an ounce of castor oil.

In the evening I learnt that the oil had produced two rather copious stools, which in their passage had produced some uneasiness in the belly. The pulse had risen to 96 beats, being the first time it had become quicker in any marked degree since the operation. I examined the abdomen attentively, and as there was no tenderness or fulness, I did not think it advisable to make any alteration in the treatment, leaving merely strict injunctions to have her watched.

Friday morning, May 29.—In all respects going on well. She complains occasionally of slight griping pain in the bowels, which she attributes to

flatulency. I observed a slight hardening about the situation of the neck of the sac—the product of inflammatory consolidation of the parts divided, with an increase of suppuration at the lower part of the wound, which clearly explains the acceleration of the pulse noticed on the previous evening. To-day there was a slight intermission in the pulse, and averaging from about 94 to 96 beats. No pain whatever, and abdomen soft and yielding. Ordered a little fresh meat, and half a pint of ale daily.

30, Friday morning.—In a state of convalescence. Pulse sunk to 84 beats in the minute; bowels moved naturally.

31, Saturday.—Doing well in all respects, the bowels having recovered their natural healthy action; no sickness being present; and as she states herself to be in all respects as in ordinary health, I have deemed it quite unnecessary to note down any additional minutes of her case.

I am induced to make a few observations on this case because it exhibits, in a very striking manner, the great advantage resulting from leaving nature in some measure to bring about her own healthy processes.

I am the more solicitous also to impress the few brief particulars of this case upon the minds of students in general, because, according to the prevailing notions of surgical treatment, almost every symptom of uneasiness or pain is directly referred to an inflammatory cause. Abstraction of blood is decided upon, “*instanter*,” and a course of purgatives instituted, which, in the majority of instances, I will affirm bring on a train of fatal symptoms; or, if otherwise, superinduce a condition of debility not easily to be obviated.

For the truth of these assertions I need only refer to the abundant and glaring examples with which our weekly and monthly magazines and journals teem; and, what is of still greater moment, the erroneous clinical inductions drawn from these mistaken modes of treatment, and which are instilled into the minds of students.

Take, for instance, the late failures of operations for lithotomy and hernia. It is impossible and unreasonable to refer the fatality to the operation itself generally. Ought we not, therefore, to seek the cause for such marked fatality

in the after treatment? *For example*: a man submits to the operation for the stone. After summoning up courage to submit to it, and to the fatigue and unavoidable nervous disturbance and exhaustion such an operation necessarily produces, he is removed to his bed. Probably during the time occupied in the operation he is occasionally drenched with wine, (though every practitioner is well aware how little the stomach, so circumstanced, is in a state to be benefitted by it). Perhaps there has been unavoidable delay in the extraction of the stone; or he may have lost blood in considerable quantity during the operation; or there may be a continuance of it, to a certain extent, after being put into bed. Now before I speak of the ordinary mode of treating such cases, I beg permission to ask one question. Do surgeons usually wait twenty-four hours to allow nature to rally from the late violence inflicted? I answer, without fear of contradiction, *no, they do not*; and I substantiate my assertion by referring students to the published details of cases for the last twelvemonths.

Instead of allowing a period of time to elapse after the operation, how often do we witness the ill-timed interference of art!

Calomel, and even opium conjoined, is often administered immediately after the operation; and repeated every two, three, or four hours afterwards; and should any pain or uneasiness arise, venæsection is ordered to a considerable amount, forgetting, perhaps, that the symptoms are in all probability as much induced by the purgatives employed as by that "bug-bear" of practitioners, viz. "*inflammation*."

Calomel, given internally, or almost any other purgative, will cause uneasiness or pain simply by irritation; and yet how much is all this overlooked after the greater operations!

Venæsection is instituted and repeated; the same causes of irritation are persevered in; and, ultimately, as might fairly be expected, the very state of things brought into action by the very remedies employed for obviating them.

I shall not trespass longer upon the pages of your excellent publication, wishing merely to call the attention of practitioners in general to these points, as I am convinced, from a very

large share of practical experience in one of the most important hospitals in the kingdom, that my observations are correct.

Upon some future occasion I shall furnish you with some practical confirmations of my opinions.

I remain, Sir,

Yours respectfully,

ALFRED JUKES.

MEMORANDA OF LOCKE.

To the Editor of the London Medical Gazette.

SIR,

You very justly term the paper read at the College of Physicians last Monday a "literary curiosity;" it is too much, however, to say, that this paper, for the first time, sets a doubtful question at rest relative to the celebrated Locke. It is only a detail of a well-known fact, viz. his attendance on the Countess of Northumberland. He took a degree of Bachelor of Physic 1674, and there is abundant proof that he practised—so much so, that I gave him a place amongst his contemporaries in the "*Nugæ Chirurgicæ*," together with my reasons for so doing.

The manuscript of Sir Hans Sloane will furnish any one, if he pleases, with many practical anecdotes of his zeal in performing the duties of a physician. In one letter he says—

"It is very kindly and charitably done of you to send me some news, from the commonwealth of letters, into a place where I seldome meet with any thing beyond the observation of a scabby sheep, or a lame horse. The great spleen you found in the woman you opened seems to be owing, as you rightly judged, to the polypi which swelled the sanguinary vessels, since the other parts of the spleen were every way right. This is an observation very well worth recording and publishing, and may give great light about tumors in the abdomen, which are not always to be imputed to aposthumes, or collections of peccant humours. Polypus's in the blood vessels are found so frequently, that I think they would deserve to be treated of as a particular disease; if there were collections enough of their history and symptoms to build any theory on, and lay a foundation for their cure. Pray when you doe me the

favour to write to me again, do not forget to set downe the diameter of the biggest vessels you found in that spleen, what part of an inch it was."

In another he observes :—

"Now I am writing, give me leave to say one word more, though on a subject very different. The story I have heard of the performance of a strong man, now in London, would be beyond belief were there not so many witnesses to it. I think they deserve to be communicated to the present age, and recorded to posterity; and therefore I think you cannot omit to give him a place in y^r Transactions; his age, country, stature, bigness, make, weight, and then the several proofs he has given of his strength, w^{ch} may be a subject of speculation and enquiry to the philosophical world."—*Bibl. Sloan.* 4052.

And lastly, he writes with considerable anxiety for advice :—

"Dear Sir,—I have a patient here sick of the fever of this season; it seems not violent, but I am told 'tis a sort y^t is not easily got off; I desire to know of you what y^e fevers in town are, and what methods you find most successful in them; I shall be obliged by your favour, if you will give me a word or two by to-morrow's post, and direct it for me to be left at Mr. Harrison's, in the Crown in Harlow.

"I am, Sir, your most humble servant,
"J. LOCKE."

This is sufficient to authorise his having a niche with the "*Medici Family*;" and, for the sake of medical science, and the cause of humanity, we may regret the accident that took *Dr. Locke* out of practice. I am, Sir, yours, &c.

WM WADD.

LETTER FROM DR. GOOCH*.

To the Editor of the London Medical Gazette.

Brighton, June 6, 1829.

SIR,

A PATIENT called on me yesterday, requesting me to prescribe for her, adding that she had heard from her apothecary, who had read it in the Medical

* The paragraph alluded to by Dr. Gooch is the following: it occurs in our analysis of his work :—
"Dr. Gooch presents an interesting example of a man broken in health, and compelled to abandon (we trust but for a time) the practice of his profession, retaining, amid bodily suffering, the full vigour of his mind," &c.

Gazette, that I had retired from practice. As I am not like Madame de Genlis, who was so fearful of what was written about her that the instant she espied her name in a book she immediately shut it, I procured the Medical Gazette, and there I found that, in your account of my volume on the Diseases of Women, you have described me as "broken in health, and compelled to abandon the practice of my profession." It is true that you have added, "we trust only for a time;" but this bye remark had been forgotten by the reporter, was unknown to my patient, and I am quietly laid on the shelf, where, if Providence permits, I beg leave to inform you I shall not quietly remain. Some years ago, like the present Bishop of Gloucester, I was reported to be dead, and a gentleman called at my house to inquire the day on which my little library was to be sold. It is quite true that I have been ill, and that I left London for my health, but thanks to Brighton, repose, and this restorative season, I am now so much better that I do not think my friends would know by my look that I had been unusually ill. From the very civil paragraph in which your statement occurs, it is quite clear that you meant me no ill, but you ought to know that it is as injurious to a physician to say that he has retired from practice as it is to a lady to say that she has committed a *faux-pas*; nobody will ever visit, or be visited by them afterwards: the one will be driven out of respectable society, and the other out of professional employment. Since I have been here, three of the best known medical men in London have come down on the same errand with myself, obliged to leave practice from ill health; and one is here still; but I will not tell their names, for fear I should do by them what you have done by me—propagate a report that they have retired from practice. Since the commencement of my dyspeptic troubles, now twelve years ago, I have seen many a healthy man in our short-lived profession pass before me to the grave; and among others, two (the physician and surgeon to an Insurance Office) who, when I offered to insure my life, objected to my health. These were Dr. Marcet and Mr. Norris. Not long ago, I saw Dr. Luke apparently in perfect health; and when I left London, only a few weeks ago, I

met Dr. Thomas Young, sauntering along the streets, and looking exactly as he has done for the last fifteen years: these and many others whom I remember in good health since I have been in creaking condition, are now dead. I am once more recovering, so that I begin to think that my life, in point of durability, is as good as that of many of my professional brethren who drive about the town with all the signs of health. Dr. Watson, the celebrated Bishop of Llandaff, whose malady was similar to mine, was refused as uninsurable at the Equitable, yet he lived thirty years afterwards, probably surviving nearly all the directors who sat at the table and rejected him. Those who know me, will scarcely suspect me of exulting that so many have died before me: one who can almost say with Pope, "that long disease my life" forms a different estimate both of life and of death to him who has known nothing either of sickness or sorrow; but this is neither the place nor the occasion for thoughts on such a subject.

When a man is assailed by the press, I know that the common advice of friends and acquaintances is to take no notice of it; and my friends may possibly think that I had better have been silent on this occasion. Few men, however, have troubled the public less than I have about their little affairs and notions. I have hitherto, at least, not been one of those who are continually perking themselves up on all sorts of small occasions, whom Mr. Grattan used to describe as "little men, but out in all weathers;" having ever thought that it was equally impertinent and impolitic—that it led only to a spurious celebrity—noisy notoriety, not solid character—and that it was better to have no reputation at all than such a one; but there are occasions on which it is admissible, and even advisable, to obtrude oneself before the public, even on subjects of no importance to them. When one author has his opinions assailed by another, he may possibly think that the attack itself, or the attacker personally, is not worth notice—may determine to keep out of the hot water of controversy, hold a provoking silence, and leave the public to judge for themselves; but when a mis-statement is published which concerns him personally, I think the sooner it is publicly contradicted the better. The

author of the mis-statement may be insignificant, or worse, but the mis-statement is read by hundreds who know nothing of the impurity of its source, and the contradiction is necessary from the importance of the press, not of the person who has used it on this occasion. A free press is a vast speaking trumpet, through which the most insignificant voice is heard far and wide, and its errors are sometimes worth contradicting, not from fear of the trumpeter, but of the trumpet. The above epithets, "insignificant, or worse," are of course not applied to you, or indeed to any one. I have nobody in my eye; the opinion is a general one.

Relying that you will efface the unintentional impression produced by your statement, and assuring you that, although I was "*broken* in health," I am now *mended* again—that although I had "abandoned for a time the practice of my profession," I shall soon return to it, I am, Sir,

Your obedient humble servant,
ROBERT GOOCH.

ANALYSES & NOTICES OF BOOKS.

"L'Auteur se tue à alonger ce que le lecteur se tue à abrégér."—D'ALEMBERT.

Disorders of the Mind in Lying-in Women.

(Being a continuation of the Analysis of Dr. GOOCH's Work on the Diseases of Women.)

THE mind of a female may become disordered at any time during the processes of utero-gestation and lactation, but there are two periods at which this is more apt to occur—viz. within a few days after labour, and several months afterwards, during the exertion of nursing. Instead of a general description, which, if full, would embrace a multiplicity of circumstances that never occurred simultaneously, the author gives two cases as specimens.

A lady who had laboured under "a brain fever," after her former confinement, came to town to be under the care of Dr. Gooch, who thus continues:

"She had a short and easy labour, a good supply of milk, nursed her child, and continued to do well for so many days, that her friends concluded all danger was over; nevertheless, from

the circumstances of her former confinement, I visited her twice a day, but I detected nothing which indicated the approach of disease; her pulse was not quick, her nights were disturbed only by occasionally suckling the child, and her manner and appearance were unaltered. On the tenth day after her delivery, the shop of a pianoforte-maker in Oxford-street caught fire; this occasioned a great bustle in the neighbourhood, but as her sitting-room did not look into the street, it was kept from her knowledge during the day; but in the evening, while she was standing at her window, which looked into a yard at the back of the house, a piece of burning matter fell within her sight. I saw her about two hours afterwards, at nine in the evening; she was not herself—her manner was agitated: on being questioned about her feelings, she kept silent for some time, and then answered abruptly; her pulse was quick, and her look and manner odd and unnatural. I slept in the house. At four o'clock in the morning the nurse waked me, and said that her mistress had had no sleep—that she was sitting up in bed talking to herself, but that instant had expressed a wish to see me. I rose and went to her; there was only a rush-light in a remote part of the chamber: as soon as she saw who I was, she told me to sit down and look at her; I said, ‘I do.’—‘What do you see?’—‘Nothing but yourself.’—‘Look at my head.’—‘I do.’—‘Do you see nothing particular there?’—‘Nothing.’—‘Then I was presumptuous: I thought that a glorious light came out of my temples, and shone about my head. I thought I was the Virgin Mary!’ It is curious that the immediate cause of the disturbance was a lighted body, and that the first hallucination was concerned about light. She was put under the care of a nurse accustomed to such patients, and an eminent physician saw her with me. Her pulse was soft, and never very quick, and her face pale; nevertheless, from a fear of congestion in the brain, her head was shaved, and ten ounces of blood were extracted from the scalp by cupping-glasses, without diminishing in the slightest degree her violence and incoherence; her conjunctiva was yellow, her tongue furred, and her bowels costive; hence she was moderately purged, and about three weeks from the commencement

of the illness she returned to her country-seat well. She was confined again about fifteen months afterwards, without any recurrence of the disease: about a week before this latter delivery she had the jaundice, of which she was cured by calomel and aloetic purgatives, before she fell in labour. It is practically important to notice, that she had the jaundice at the time of her first confinement, and became maniacal; that she had a slight degree of it during her second confinement, and suffered the same disease; that she was completely jaundiced before her third confinement, that it was removed by purgatives before labour, and that she this time escaped her mental derangement.”

The form of disease occurring when the body is reduced by the drain of lactation, is thus described:—

“A pale delicate lady, nursing an infant four months old, told me that she scarcely knew what was the matter with her: her sight was so impaired that she could not read; her powers of attention were so much impaired that her household accounts were burthensome to her; that she often rang for the footman, and when he came she had forgotten what she had rang for. She said she had a good husband, sweet children, ample property, every thing to make her happy, yet she felt no interest in life. She added, that if this went on thus she should lose her senses. She had lost flesh, and had little milk. After a short time she took it into her head that she had a fatal disease, and I was called out of my bed several nights to see her die. She told me that I was quite mistaken about her case; that she was sure she was dying, and that if I would sit down for five minutes I should see her expire. She next began to accuse her friends, especially her husband, whom she charged with infidelity, and an intention to poison her; and it became necessary to separate her from her family, and place her in that state of seclusion and control usually employed under such circumstances. She continued in this state many months, but ultimately recovered, and has had a child since without a recurrence of the disease.”

In another instance the complaint assumed the form of catalepsy. A lady, twenty-nine years of age, had been married nine years, had been several times pregnant, but had only borne

one living child, having either miscarried or had premature labours. A few days after her last lying-in (of a dead child, at the seventh month), she was seized with violent head-ache and pain in the face, with a weak pulse, flatulence, and depression of spirits. One morning she made an unsuccessful attempt to destroy herself. She was now seen by our author and Dr. Sutherland jointly, when she was put under the care of a regular attendant, and became so violent as sometimes to require the strait-waistcoat.

"A few days after our first visit we were summoned to observe a remarkable change in her symptoms; the attendants said she was dying, or in a trance; she was lying in bed motionless, and apparently senseless; it had been said that the pupils were dilated and motionless, and some apprehensions of effusion on the brain had been entertained, but on coming to examine them closely, it was found that they readily contracted when the light fell upon them; her eyes were open, but no rising of the chest, no movement of the nostril, no appearance of respiration, could be seen; the only signs of life were her warmth and pulse; the latter was as we had hitherto observed it, weak, and about 120; her fæces and urine were voided in bed.

"The trunk of the body was now lifted so as to form rather an obtuse angle with the limbs (a most uncomfortable posture), and there left with nothing to support it; there she continued sitting while we were asking questions and conversing, so that many minutes must have passed.

"One arm was now raised, then the other, and where they were left there they remained; it was now a curious sight to see her, sitting up in bed, her eyes open, staring lifelessly, her arms outstretched, yet without any visible sign of animation; she was very thin and pallid, and looked like a corpse that had been propped up, and had stiffened in this attitude. We now took her out of bed, placed her upright, and endeavoured to rouse her by calling loudly in her ears, but in vain; she stood up, but as inanimate as a statue; the slightest push put her off her balance—no exertion was made to regain it—she would have fallen if I had not caught her."

She had three attacks of this kind: the first lasted fourteen hours, the

second twelve, the third nine; the intervals being two days after the first fit and one day after the second. After this, the disease returned to the usual form of melancholia, and she recovered in three months.

In considering these cases, there are two questions which naturally suggest themselves—first, as to the degree of danger; and secondly, as to the probable duration of the attack, and the risk of its being incurable? An idea was formerly prevalent, even among medical men of eminence, that these diseases were never fatal; and even Dr. Baillie, when consulted about a patient of our author's, remarked, "that the question was not whether she was to get well, but when she was to get well?" She died within a week after.

There are two modes of calculating the probability of death in any individual case—the one to ascertain the proportion of deaths to recoveries on a great scale, the other to discover the symptoms indicative of safety or danger in individual cases. The former of these is obviously, for many reasons, wholly incapable of affording any accurate prognosis. With regard to the second mode, that of estimating individual cases, our author quotes a passage from the MS. lectures of Dr. W. Hunter, and follows it up by some comments of his own.

" 'Mania,' says Dr. Hunter, 'is not an uncommon appearance in the course of the month, but of that species from which they generally recover. *When out of their senses, attended with fever like paraphrenitis, they will in all probability die*; but when without fever it is not fatal, though it (*i. e.* fever) generally takes place before they get well. I have had several private patients, and have been called in where a great number of stimulating medicines and blisters have been administered, but they have gone on as at another time, talking nonsense till the disease has gone off, and they have become sensible. It is a species of madness they generally recover from, but I know of nothing of any singular service in it'."

Our author then continues—

"Making allowance for the loose language of extemporaneous lectures, and allowance also for some inaccuracy in the notes of these lectures, and putting together this statement of Dr. Hunter with my own experience, I extract from

it the following meaning: that there are two forms of puerperal mania, the one attended by fever, or at least the most important part of it, a rapid pulse; the other accompanied by a very moderate disturbance of the circulation; that the latter cases, which are by far the most numerous, recover; that the former generally die. This agrees closely with my own experience."

Mania coming on soon after confinement, is more dangerous, as regards the life of the patient, than melancholia which comes on while suckling. Constant want of sleep, and increasing exhaustion (a quick, weak, fluttering pulse), are of unfavourable omen, even if the mind be apparently improved; while good nights, and a pulse becoming slower and firmer, are held out as favourable prospects, even although the mind continue disordered. With regard to its duration, mania is less apt to be permanent than melancholia: "it is more dangerous to life, but less dangerous to reason." Another question of moment is, whether a woman whose mind has been deranged after one accouchement is likely to be similarly affected again? The chances, Dr. Gooch thinks, are against the recurrence of the disease: he has attended many patients who had been brought to town to be confined, because on a former occasion they had been deranged; but he never knew the complaint recur except in one instance—that given above.

With regard to the causes of puerperal insanity, in a large proportion of instances it arises in patients in whose families derangement has already appeared, and the individuals themselves have been persons of nervous temperament, having those peculiarities especially marked which distinguish the female from the male constitution. Sometimes they have been long under the influence of depressing passions, or exposed to violent agitation; but in other instances no circumstances of this nature have occurred, and in these the attack would seem to depend upon what Dr. Gooch, in his paper published in the *Transactions of the College of Physicians*, called "that peculiar state of the sexual system which occurs after delivery." This expression has been objected to, as not sufficiently explicit; and he now farther explains his meaning by saying, that "The sexual system in women is a set

of organs which are in action only during half the natural life of the individual, and even during this half they are in action only at intervals. During these intervals of action they diffuse an unusual excitement throughout the nervous system—witness the hysteric affections of puberty, the nervous susceptibility which occurs during every menstrual period, the nervous affections of breeding, and the nervous susceptibility of lying-in women. I do not mean that these appearances are to be observed in every instance of puberty, menstruation, pregnancy, and child-bed, but that they occur sufficiently often to show that these states are liable to produce these conditions of the nervous system." Dr. M. Hall has supposed that the susceptibility of the puerperal state may be explained by exhaustion merely, without any thing specific: but in this Dr. Gooch does not agree with him, having frequently seen patients who have been deranged on one occasion, and yet have recovered from another lying-in without any return of the complaint, though much more exhausted in body and agitated in mind.

A disordered state of the digestive organs was very manifest in some cases, but less so in others.

Weaning, or sudden suppression of the milk, is asserted frequently to have produced puerperal insanity. The author has never seen this; although he has seen the milk suppressed in those who did not wish to suckle their children "in more than a hundred instances."

We now come to the most important question of all: "What is that morbid state of organization on which disorder of the mind depends?" There is, as our author observes, a strong disposition to attribute raving of the mind to inflammation of the brain; but experience demonstrates that mental derangement may be present in very opposite states of the circulation.

"Cerebral excitement does not necessarily depend on inflammation or congestion, nor is depletion, however moderate, necessarily the proper remedy. Cerebral excitement is often aggravated by depletion; and in some cases, as I shall have occasion to relate, absolutely brought on by it. Now the question, what is the morbid state of organization on which puerperal insanity depends,

must be determined in the usual way. There is only one safe mode of working the problem, by observing the causes which brought on the disease, the bodily symptoms which accompany it, the way in which it is affected by remedies, and the morbid appearances discovered after death."

A lady became deranged a few days after her delivery. She had had an alarming hæmorrhage. Dr. Gooch found her sitting in her chair, looking first to one side, then to the other; talking incoherently; and she either could not or would not answer questions. Her face and lips were colourless, and her pulse small and frequent. She had mild aperients and unstimulating nutriment; under which means she gradually recovered her health, and with it her mental faculties.

A lady in good health had an easy labour, but the placenta adhered, and was removed by the hand. The after-pains were severe and long continued, requiring opiates. On the second day she had distinctly inflammation of the uterus, and, for three days, general blood-letting was freely practised. On the evening of the third day she still had tenderness in the region of the uterus, but her attendants feared to bleed her again, she was so much reduced in strength and pulse. Another opinion was taken, and this was given in favour of farther depletion. The patient's head was placed low, and five cupsful taken before she fainted. When Dr. Gooch, who slept in the house, left her, at one in the morning, she was still rather faint. The farther progress of the case will best appear from his own account :—

"At four o'clock the nurse waked me to say, that her mistress 'was much changed,' and she thought was dying. I found her cold and clammy, with a thread-like pulse, and pale sharp features; her mind too rambled a little. I mixed some wine and hot water, gave it her by spoonsful, and in about an hour, her skin being warmer, and her pulse more distinct, I directed a spoonful to be given every fifteen minutes for another hour, and then went and laid down again. When her medical attendants mustered at breakfast time, she was so far recovered that they could scarcely believe what I told them of her state during the night. The pain and tenderness of the uterus were gone, and

they were much satisfied with the result of the bleeding. In the afternoon, however, a hurried message was sent off for her medical attendants. I arrived first, and found her sitting up in bed talking incessantly and incoherently, and now and then expressing a wish that she could hold her tongue. She was in a profuse warm sweat, and her pulse was much above 140. I again mixed some wine and water (I had better have given her an opiate), but after getting down about a wine-glassful of this diluted wine by spoonsful, I found that both her tongue and pulse became slower. Her physicians now one after another arrived. Towards the evening she was much calmer, but obviously not herself in mind. The next morning every one recognized puerperal mania. In this state she continued several weeks, during which it was often necessary to put on the straight waistcoat, in order to keep her in bed. In less than a month she was convalescent from her mania, and for a week or two it was supposed that she was out of danger; but now her abdomen began to swell, and she died dropsical in the eleventh week after her delivery. The body was not opened. Here was mania depending on what is called cerebral excitement, which leads most practitioners to employ cupping, cold, low diet, and purging, coming on in a state in which the circulating system was reduced to the lowest ebb."

The author was sent for one night to see a lady who had been confined a week before, of her first child. She was constitutionally nervous, but all had gone well till this evening, when her husband, who had left her in the morning as well as usual, on his return found her incoherent. Dr. Gooch found her in bed, with her eye apparently fixed intently on some object. She paid no attention to his questions, and did not speak; her pulse was 140, small and weak, and the perspiration stood in large drops upon her face and brow; her hand was affected with spasmodic twitchings, and she picked the bed-clothes. It was agreed, in consultation with two medical men in attendance, that active treatment should be postponed, and thirty drops of the *liq. opii sedat.* given in two draughts, one immediately and the other in two hours. After the second draught she fell into a sound sleep, and awoke next morning

with her pulse at 80 and her mind restored.

Various other cases, analogous as to the general phenomena, but not all treated in the same manner as the above, and not all so fortunate in the result, are detailed; our limits admit only of one, which we shall give at length, as it is a good illustration of the author's views on this subject.

"I had no concern in the treatment of the following case, but being in the house where it was, to see another patient, I was taken by her medical attendants into her chamber, where I found her sitting up in bed in a straight waistcoat, with a flushed cheek, a dull eye, and occasionally uttering unintelligible words; her pulse was much above 100, but I did not count it, and her attendants remarked that it was getting hard. She did not look at all like a person within six hours of her death, so that I was much surprised to hear that she died that evening after being blooded to faintness, which took place when she had lost about eight ounces. I received the following account of the case from those who attended her:—

"E. B. 23 years of age, was delivered of her first child on the 30th Dec. On the evening of the day of her delivery she had a rigor, succeeded by heat of skin, and constant pain at the lower part of the abdomen, increased by pressure. The pulse was 130, and weak. An injection was given, a large poultice was applied over the belly, and she took ten grains of the compound powder of ipecacuanha. Her bowels were opened by the injection; she slept well during the night, and the next morning (the 31st) the pain was gone, but the soreness remained. The next day (1st January) she complained of tightness of the head, her tongue was furred, her skin hot, her pulse 120, and weak; her bowels had been moved several times the day before. She now took five grains of calomel, her head was shaved, and six leeches were applied. At two o'clock on the same day she was visited again; her eyes were bright, her face was flushed, her skin hot; she spoke indistinctly, and her mind rambled; her pulse, which in the morning was weak, was now thought to be getting hard, and she was ordered to be bled from the arm till she fainted. Two grains of calomel were ordered to be taken every two hours. She was

bled at three o'clock in the afternoon: as the blood flowed, the pulse became so quick it could not be counted; hence, when she had lost eight ounces, it was stopped, although she did not feel faint. At six o'clock, when the attendant went to give her the calomel, she had scarcely any pulse. At eleven in the evening the pulse could not be felt: she looked deadly pale, the crassamentum of the blood was flat and red, with little serum; her mind wandered, but she knew her mother and relatives, who stood at the bed side. Attempts were made to revive her by cordials, but she sunk rapidly, had a cadaverous smell, a cold skin, and died at four in the morning. The body was examined eleven hours after death: in the abdomen the viscera were healthy, the peritoneum also; the external and internal surface of the uterus, as also its substance, were examined, and found natural; there was about half a pint of reddish fluid in the peritoneum; in the head the sinuses were thought to be rather more loaded than natural, the dura and pia mater rather thicker than usual; there was no unusual effusion any where; the plexus choroides appeared unusually pale; the substance of the brain was firm, and on slicing it no bloody points appeared*."

The author observes, that the very number of cases which he details is alone sufficient to disprove the idea of their being "picked," and alludes to the Essay of Dr. Kelly, and to Dr. P. M. Latham's account of the epidemic at the Millbank Penitentiary, in order to shew that those pathologists are mistaken who look upon increased vascularity of the brain and effusion, however slight, as infallible signs of congestion and inflammation having existed during life. Of course Dr. Gooch does not deny the existence of such a disease as phrenitis in lying-in women, although he looks upon it as rare. Inflammatory head-aches, in which the patient has pain in the head, vertigo, singing in the ears, a flushed face, and quick pulse, are not uncommon. In most of these there is no disorder of the mind; and where this occurs, it follows the inflammation of the brain—neither equally

* In the comments upon these cases, as given by Dr. G., No. X. and No. XI. ought to be No. IX. and No. X. It was the above case (No. IX. and not No. X. as stated in the work) in which the patient "fell as if shot, under the stroke of the lancet."

in degree nor resembling in kind the mental derangement of mania, or melancholia. A case is given (No. XII.) which amply proves that, in genuine inflammation of the brain, the author is not backward in using the most active depletion; but the more immediate object of the paper is another class of cases; and we shall conclude our analysis of this part of the volume by quoting the author's directions for the treatment of puerperal insanity.

“ I. The constant attendants on the patient ought to be those who will control her effectually but mildly, who will not irritate her, and will protect her from self-injury. These tasks are seldom well performed by her own servants and relatives.

“ If the disease lasts more than a few days, and threatens to be of considerable duration, her monthly nurse and own servants ought to be removed, and a nurse accustomed to the care of deranged persons placed in their stead. Such an attendant will have more control over the patient, and be more likely to protect her from self-injury. She should never be left alone, and every thing should be carefully removed with which self-injury can be effected; such as cutting instruments, garters, handkerchiefs, towels. The windows of her chamber ought to be carefully secured. With regard to the removal of her husband and relations, this also will be a question, if the disease threatens to be lasting—it is generally right. Interviews with relations and friends are commonly passed in increased emotion, remonstrance, altercation, and obviously do harm; large experience, also, is decidedly favourable to separation as a general rule, yet there may be exceptions, which the intelligent practitioner will detect by observing the effect of intercourse. The husband ought never to be left alone with his deranged wife, for obvious reasons. I have known more than once a neglect of this rule produce consequences which left in the minds of those concerned a never-ending regret. On this subject a serious appeal ought to be made to the sense and feeling of the husband.

“ II. The next rule regards the diet of the patient. It ought never to be very low; the lowest ought to consist of nutritious and unheating fluids, such as equal parts of gruel and milk, or

gruel and good veal broth, or milk alone; and of these a quart ought to be given in the twenty-four hours. If there is any heat or thirst the broth had better be omitted; but the cases in which this diet requires to be reduced are few; it even sometimes requires to be mended. If the patient is pale, and the temperature of the skin lower than natural, it is useful to add to the above diet two ounces of wine daily, mixed with gruel. When the patient is in such a state of mind as not to ask for support, and even object to take any, a thoughtless nurse will allow hours, and even days, to pass with no other food than a cup of tea or water-gruel, at long intervals—a neglect which I have known to be of serious consequences; but if the disease after many days continues unabated, a daily portion of solid meat may be necessary, and the rule for it is this: if there is nothing in the bodily symptoms, separate from the disorder of the mind, which forbids it, this state of the mind is no objection to, but rather an argument, for it. Hospital patients are sometimes clearly benefitted by a cup of caudle several times a day; but to them diffusible stimulants are more safe and necessary than to persons of temperate habits. After being long accustomed to a daily supply of gin, they come into a lying-in hospital, suffer pain, lose blood, live on water-gruel, and take purgative medicines. If mania attacks them under these circumstances, a moderate quantity of wine is sometimes strikingly beneficial. Thus I would manage the diet in mania which occurs soon after delivery; but when melancholia attacks a woman long after delivery, who has been drained and enfeebled by nursing, a nutritious, and even cordial diet, is necessary in all cases. She should take meat every day, with about four ounces of wine. Cupping, low diet, and purging, would confirm her disease, and perhaps convert it into idiotism. Lastly, if mania attack a woman after sudden weaning, so that there is reason to believe that the disorder of the mind has been caused by the sudden suppression of milk, (a case very different to that which I have last described, and one which I have not witnessed,) there would be reason to suspect an inflammatory affection of the brain; but this must be determined, and the treatment

regulated, not by the disorder of the mind, but by the bodily symptoms which accompany it.

“ III. The third rule relates to the medicinal agents necessary in the treatment of these diseases. These are, 1st, Such as reduce the force of the circulation, especially blood-letting. 2d, Such as evacuate gastric and intestinal impurities, and amend the secretions which flow into the alimentary canal, as emetics and purgatives. 3d, Such as give sleep during the night, and calmness during the day: these are the various narcotics. 4th, Such as sustain the vital powers, as tonics and stimulants. These are not all necessary in each case, but it is out of these a selection must be made adapted to the circumstances of each case. 1st, With regard to blood-letting, the chief means of reducing the force of the circulation, the result of my experience is, that in puerperal mania and melancholia, and also in those cases which more resemble delirium tremens, blood-letting is not only seldom or never necessary, but generally, almost always pernicious. I do not say that cases never occur which require this remedy; no man's experience extends to all the possibilities of disease, but I have never met with such cases; and I would lay down this rule for the employment of blood-letting—never to use it as a remedy for disorder of the mind, unless that disorder is accompanied by symptoms of congestion or inflammation of the brain, such as would lead to its employment though the mind was not disordered. Even here, however, great caution is necessary; local is safer than general bleeding. In Case X. the head was hot, and the face red, and the pulse was said to have become somewhat hard, yet a bleeding of eight ounces was followed by an extinction of the pulse within three hours, and death in less than six. The only cases attended by a very quick pulse, which I have seen recover, were those in which no blood was taken. In the really inflammatory diseases of the brain, blood-letting is of course essentially necessary; but these, I think, can never be mistaken for puerperal insanity; they are febrile head-aches, more or less acute. Pain of the head, with fever, is a much better indication for blood-letting than disorder of the mind without these symptoms. 2d, With regard to remedies which evacuate gastric and

intestinal impurities, the activity with which these remedies are employed must depend on the distinctness with which these states are present. If the powers of the constitution are not low, and the gastric symptoms are very marked, namely, a foul tongue, an offensive breath, a yellow eye, an emetic, not of antimony, but ipecacuanha, may be given. Vomiting has sometimes been followed by such signal success in the treatment of mania, that some eminent physicians have considered it the most efficient remedy; but where the face is pale, the skin cold, and the pulse quick and weak, I should fear the depressing influence of nausea and vomiting. When the stools are very unhealthy in colour and odour, one or two active purges ought to be given, and a moderate action in the bowels kept up by such purges as empty the alimentary canal without drawing fluid from the circulation, such as the compound aloetic pill, or the compound decoction of aloes. Where, however, the gastric symptoms are very slight, and the powers of the system much exhausted, active and prolonging purging is injurious: the utmost that is necessary and right is a dose of the aloetic pill, or decoction, sufficient to move the bowels plentifully once a-day. 3d, The most valuable medicines in the treatment of puerperal mania are narcotics. If given at proper times and proper doses, they often procure nights of better sleep, and days of greater tranquillity. This calmness is most likely to be followed by some clearing up of the disorder of the mind. These remedies produce these salutary effects much oftener in the mania of lying-in women than in mania occurring under other circumstances; for it is more uniformly a disease of nervous excitement and debility. If the head is hot, the cheek flushed, and the patient thirsty, they ought to be postponed; but if these symptoms have been removed, or are not present, sedatives ought to be given, and the most efficient, first. After many days and nights passed in perpetual wakefulness, it is an urgent object to procure tranquil sleep. For this purpose twenty minims of the sedative solution of opium may be given at once, and repeated in two hours if the patient is not asleep; even a third dose may be given in two hours more if the two first doses have failed, but the cases in which

opium has been most successful, have required at most two full doses. When sleep has once been procured, small doses, such as five or ten minims, should be given at intervals of six hours. If these small doses procure sleep by night, it is unnecessary to return to the larger doses, but these may be used occasionally when the smaller doses fail. Constipation must be prevented by a daily dose of the compound aloetic pill or decoction, or, if these fail, by the compound extract of colocynth, which is made more soluble and active by mixing it with one-third of soap. If the sedative solution of opium should produce any of the ill effects which this drug is known occasionally to produce, such as head-ache, foul tongue, sickness, heat of skin, it should be discontinued, and the milder narcotics tried, of which the best is hyoscyamus mixed with camphor; five grains of each may be given every six hours, but the night dose should be doubled. It may be dissolved in an ounce and a half of camphor mixture. When once opiates have attained their objects, they should be withdrawn, not suddenly, but gradually, diminishing the dose, lengthening the interval, watching the effect of this abstraction of the remedy, mending the diet whilst withdrawing it, and returning to the old doses if the diminution of them occasions any unfavourable symptom. 4th, There are cases and times in which medicines which sustain the vital powers of the constitution are necessary and useful. When there is a total absence of febrile or inflammatory symptoms, when the face is pale, the skin cool, or even cold, and the pulse very weak, a scruple or half a drachm of the carbonate of ammonia, divided into four doses, may be given during the 24 hours. The time comes when opiates have been tried, and are no longer necessary, or have failed; the disease threatens to set in for a length of time, and the great object of the physician is to support the patient through a long, wearing, exhausting disease. This is done best by supporting her appetite for food, and in these cases the mineral acids are of essential service. The English physicians, most eminent for the treatment of insanity, employ these medicines much under these circumstances; they may be given alone, or with a light bitter, or even bark, three times a-day.

“IV. The last rule I have to mention

relates to seclusion and control. There can be no doubt that it is generally necessary and useful to separate the patient from all those persons who are sources of excitement of any kind. This, however, can be effected only in one of two ways—either in a separate house, or part of a house, where the patient has no other associates but her nurses, or in a receptacle for the deranged, where she has no other associates than her nurses, and persons similarly afflicted with herself. This is the only society she has, excepting the short and occasional visits of the physician. Thus the power of controlling her, even by force, is placed in the hands, not of enlightened and benevolent persons, but of uneducated menials. I do not know how it can be otherwise, though I wish it could; but I think such a charge ought never to be placed in such hands without the most vigilant scrutiny of its exercise. There may be cases, or there may come a time, at which some interruption to this solitary life may be advisable. When the disease has lasted long, when the patient expresses a strong wish to see some near friend, when she entertains illusions, which the sight of some one may efface, the admission of such person is worth a trial. I shall be told, that when patients are mending, or have recovered, the most common cause of relapse is too early an introduction to friends, and too early a return home. When the patient is recovering, or has recovered, I do not recommend these measures. It is when the patient has not recovered, and is not recovering, that I advise them to be tried; when month after month passes without any amendment, and her mental delusions assume a shape accessible to moral impressions, then it is that I would advise an interview with a friend.”

[To be continued.]

MEDICAL GAZETTE.

Saturday, June 13, 1829.

“*Licet omnibus, licet etiam mihi, dignitatem Artis Medicæ tueri; potestas modo veniendi in publicum sit, dicendi periculum non recuso.*”—CICERO.

ANATOMY BILL.

THIS bill was withdrawn on Friday last, at the suggestion of the Archbishop of

Canterbury. In our last number we anticipated this result, and the quarter whence the most decided opposition was to come.

Had the measure been rejected on account of the appendages with which it was loaded, while the general principle was acknowledged, we could scarcely have blamed those who were opposed to it; but when we see some noble lords, whom Providence has placed in the situation of legislators, possessing all the prejudices, and, on this subject at least, all the ignorance which belongs to the lower classes, we cannot but regard it as a curious illustration of the occasional approximation of intelligence and feeling in the two extremes of the community. Though the bill has been for the present withdrawn, however, it is under circumstances which shew beyond a doubt *that one similar in principle MUST pass next session*. Be it always understood that we contend for the principle of this bill, not for the details: and the principle we understand to be, that of acknowledging anatomy to be a science which it behoves the public welfare to encourage—while the system of exhumation, by which it is at present supported, is an evil which requires to be suppressed; that these two objects can only be accomplished by providing from another source such a supply of subjects as to meet the wants of the anatomist, and render the trade of the resurrectionist unnecessary. For this purpose a portion of the community must be given up for the benefit of the rest, and it only remains to determine what portion may be thus appropriated with the least violence to public or individual feeling. Now as the act of dissection is universally allowed to affect not the dead, but the living, whence can the requisite supply for the purposes of anatomy be so properly derived as from those who have been maintained at the public cost during life, and who have no relations to feel

for them, or even to inquire after them, when dead? It has been said with truth, that such an enactment would apply chiefly to the poor; but it is not therefore the less just. It is only a part of the general constitution of society, which renders the poor liable to various disadvantages (many of them much more serious than this), which their more wealthy brethren are enabled to avoid. It would be every whit as reasonable to argue that it was cruelty towards the poor not to have them fed, and clothed, and lodged as well as others, because the fault of their poverty lies not with them. But, besides, we have already repeatedly demonstrated that the poor are the very persons whose interests are most secured by granting facilities to the cultivation of anatomy.

The cant (for it is no better) about cruelty to the poor, so industriously put forth by a set of meddling blockheads, eager to thrust themselves into a little temporary notoriety, was well exposed by Lord Calthorpe; indeed, his observations throughout were marked by a perfect understanding of the true bearings of the question.

“Unless he was thoroughly convinced of the necessity of legislating on such a subject, he would not propose the present bill to their lordships; but he thought that a remedy was imperiously called for, in order to put an end to a most disgraceful and disgusting state of things at present prevailing. He was not inclined to comply with the request of the right reverend prelate (the Archbishop of Canterbury), because he was perfectly sure that the more the provisions of the bill were considered and studied the more they would be found calculated to supply the deficiency at present existing in the supply of anatomical subjects, which occasioned the revolting scenes which so often took place. He was aware, however, that scarcely any measure on such a subject could be entirely free from reproach. He would assume, what indeed he knew to be the fact, that the great majority of their lordships, whatever view they took of the present

bill, was not adverse to the principle of legislating on such a subject as the one to which the bill related. He thought their lordships would admit the necessity of making some such provision as the bill offered. To effect that purpose there were but two courses to pursue:—one, to connect dissection with the punishment for crime, and to enlarge the provisions of the present law, which confine that operation to the bodies of murderers; and the other, by some enactments similar to those contained in the bill before the house. He knew that one objection to the bill was founded on its being supposed to be a peculiar grievance to the poor. He certainly should be the last man to inflict any such grievance; but the slightest examination of the bill will prove, that instead of inflicting any grievance on the poor, it will prove their deliverance from great pain, anguish, apprehension, and misery; and this circumstance afforded the strongest argument in favour of the bill, if a balance were to be struck between the suffering which this bill would inflict on the poor and that which they feel from the existing state of things. Was there any class of the community so much aggrieved, whose feelings were so deeply wounded, as those of the poor, in consequence of the absence of some such enactments as were contained in the present bill? Whose remains were most easily obtained for the purpose of dissection but those of the poor? Who were they who suffered in the greatest degree from the disadvantage under which the want of a supply of subjects laid the medical art but the poor? The wealthy could command the attendance of the man of the highest degree of skill, but the poor were obliged to resort for assistance to those who, from want of proper education, in consequence of the deficiency of subjects, were not qualified to give it them. Doing, therefore, full justice to the feelings in which this objection originated, he must be allowed to say that it was founded on the greatest error and misconception. As to postponing the measure, he begged of their lordships to consider how the interval between this period and the next session of parliament would be spent. It would be an interval not only of consideration, but of the continuance of a practice which all agreed in reprobating; it would, perhaps, be an interval during which those crimes would again be com-

mitted which had long been suspected, and which last year were brought to light (hear, hear). It would be continuing, and continuing unnecessarily, an odious stigma upon a liberal and enlightened profession—upon a profession which existed only for the public welfare, and whose services and whose respectability gave them a claim upon the protection of their lordships. He had no hesitation in saying that the grievances that might be caused by delay would be infinitely greater than the benefit. As to the responsibility of bringing on the discussion, he thought that no more responsibility would lie on him on that account than upon any other of their lordships; and of such deep importance did he consider the subject to be, that he thought himself justified in saying that it was almost a duty upon His Majesty's ministers to take care that the house should not separate without some remedial measure being agreed upon. He trusted that their lordships would not leave the medical profession longer in such a condition as compelled them to become the patrons and the supporters of a class of individuals who were a disgrace to civilized society, and of whom no man could speak without horror and disgust. He trusted that their lordships would not leave medical men subject to be proceeded against in courts of law for a misdemeanor, because they acted up to their duty in qualifying themselves for the profession to which they belonged."

The Duke of Wellington, too, spoke decidedly in favour of the necessity of some enactment in favour of anatomical science, and gave his noble compeers some very appropriate advice; namely, to make themselves acquainted with the subject before next session—advice which we sincerely hope they will follow.

"He approved so strongly of the object which the noble lord had in view, and of the principle on which the noble lord professed to proceed, that if the measure had been discussed it was his full intention to have supported the second reading, and to have done all in his power to amend the bill in the committee (hear, hear). Why he was glad that the bill was to be postponed was, that he was aware of the opposition that would be raised to it, and of the quarter from which that opposition was to come;

and knowing too how much influence that opposition was likely to have upon the country, he could not help feeling that it was extremely desirable that such effects should not accompany the measure if it passed into a law. He was delighted, therefore, that the bill was to be postponed, and although he could not take upon himself the task of bringing forward a measure on the subject, yet he would willingly co-operate with any noble lord who should bring forward another measure, even on the principle of this bill, to get rid of the horrible evils which were produced by the present system (hear, hear). Unless they could increase the number of subjects for dissection, they would do nothing."

Lord Grey, the Marquis of Lansdowne, Lord Goderich, and others, spoke in favour of the bill. Against it, there were none of any weight except the Archbishop of Canterbury and Lord Tenterden. Whatever comes from the latter must always be entitled to our respect, but on this occasion it is perfectly obvious that his lordship has been misinformed. Among other objections, he urged, that "he could not see the necessity of that part of the bill which went to enable a Secretary of State to establish as many schools of anatomy in the metropolis as he might think proper." From this it is apparent that the speaker totally misapprehended the tenor of the clause, which, instead of facilitating, presents a bar to the formation of more anatomical schools than are deemed expedient. At present there is no limitation of any kind to establishments of this nature; but the requiring a license would afford a check, which, we think, would be more appropriately placed in the hands of the government than of any of our corporate bodies. In truth, Lord Tenterden, instead of regarding it as enabling the Secretary of State to establish as many schools of anatomy as he may think proper, might with more justice have looked upon it as a measure by which the Secretary of

State was enabled to prevent the present system of having an unlimited number of such schools, by licensing, through the commissioners, only as many "as he might think proper." We are glad to see that the Marquis of Lansdowne intends, next season, to bring forward his motion (probably connecting it with the anatomy bill) to abrogate the law which gives up the bodies of murderers for dissection. Lord Tenterden, it will be probably remembered, opposed this last year, in which he was joined by Earl Grey: but as the former said, on Friday night, that "he would look at a proposition of that kind in a very different point of view, if it formed part of a general system, from that in which he would look at it, if it stood by itself," so we hope the noble Earl, also, will be induced to forego his opposition.

It is perfectly obvious, from what was said by the Peers opposed to the measure, that they did not understand the subject. Much, however, is to be hoped from the effect of more full and correct information, and from the example and influence of those Peers who have already declared themselves in its favour; especially from those of the noble Duke at the head of the government.

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COLLEGE OF PHYSICIANS.

IN our report of the proceedings at the College on Monday, 1st June, we were led, by a wish to give as full an account as we could of the very interesting paper read by Sir Henry Halford, on insanity, into an unintentional inaccuracy, which has since been pointed out to us.

In the popular and classical illustrations which the President read to the Meeting, he stated the case of a gentleman whom he had attended, who was anxious to make his will, and had previously expressed an intention of making his solicitor (who had been long his intimate friend also) his residuary legatee. Before the will was executed, it became, therefore, of the utmost importance to ascertain, beyond a doubt, that the gentleman was of perfectly

sound mind; and it was to determine this point that Sir Henry Halford and another physician were requested to give their opinion. In our report we stated, that "the will was then executed, being witnessed by his physician." This was inaccurate; for a doubt arising in the mind of Sir Henry, founded on the inability of the gentleman to "reword the matter," to which he had just before given his assent, the will was not permitted to be executed. The passage from Horace, with which the President illustrated the case of the gentleman of large fortune, who bought up every thing he could lay his hands upon, without making the slightest use of his purchases, was from the 3d Satire, 2d Book, and is singularly appropriate:—

"Si quis emat citharas, emptas comportet in
num,
Nec studio citharæ, nec Musæ deditus ulli;
Si scalpra et formas non sutor; nautica vela
Aversus mercaturis; delirus et amens
Undique dicatur merito."

CONTROVERSY CONCERNING THE NERVOUS SYSTEM.

WE are authorized, by Mr. Bell, to contradict the insinuation that he is the concealed opponent in the controversy between Mr. Mayo, Mr. Broughton, and Mr. Shaw. *He has neither written nor dictated any thing on the subject in dispute.*

DEATH OF SIR HUMPHRY DAVY.

THE following is an extract of a letter from Geneva:—"Sir Humphry Davy expired on the morning of the 29th of May, a few hours after his arrival at Geneva. He bore the long journey, accompanied by his brother, apparently well, and seemed stronger and more easy than when he left Rome. On going to bed he experienced a rigor, which soon subsided, and when it was over he spoke of it as an accidental occurrence. Dr. Davy was called to his brother about two o'clock in the morning, when he found him insensible, and in less than half an hour he breathed his last." We have neither time nor space to pay a just tribute to the illustrious deceased. He was, unquestionably, the most eminent chemist of the age, and his discoveries have constituted a new era in science. It will suffice to mention the decomposition of the alkalies—the exposition of the true nature of chlorine;

—to call up recollections of his early career, when all Europe resounded with wonder and admiration of his genius. It is remarkable that within a few months, we might almost say weeks, the science of this country has lost three of its brightest ornaments, Wollaston, Young, and Davy—men of very differently constituted minds, it is true, but each impressed with the stamp of original and powerful intellect.

HOSPITAL REPORTS.

HOTEL DIEU.

Case of double Uterus and Vagina in the human subject.

On the 14th Nov. 1827, a woman was brought into the Hôtel Dieu, about 65 years of age, named Raley. She had been found on the floor of her room in a state of insensibility, and bathed in blood, which she had vomited. A few hours after her admission to the hospital she expired.

On opening the body, the stomach and the whole intestinal canal were found filled with black coagulated blood, but without any apparent breach of surface. After having carefully examined all the viscera and the vessels, which were quite empty, pale, and colourless, M. Jolly, on looking at the uterus, was surprised at the very small size of that organ. On putting the finger into the vagina, he found a membranous division, which separated that canal into two equal parts. After examining the attachments of the uterus, which were in all respects natural, he removed the rectum and bladder, together with the genital organs, which he inspected with MM. Dance and Dalmas. The external organs presented no extraordinary appearance; the entrance to the vagina was narrow and smooth, without any traces of ruptured membrane, and divided by a partition into a left and right portion of equal size; the length of the canal was four inches. The portion, half a line in breadth, was formed by the apposition of the mucous membranes; interiorly there was nothing remarkable but the smallness of its transverse diameter. The uterus presented no other remarkable feature exteriorly but its small size; it was not more than eighteen lines across; its upper external edge shewed a slight depression, which di-

vided the organ into two cavities ; from the middle of this depression a longitudinal groove ran along the whole anterior surface of the uterus and vagina. A lateral section from the neck of the uterus, prolonged along its body, exhibited the one cavity without any communication with the opposite side, both inferiorly and superiorly. The cavity of the neck was very narrow, scarcely admitting an ordinary probe, about three or four lines in length, and equally separated by a partition ; it terminated by a circular orifice, without any trace of irregularity. This orifice was situated in the centre of the neck, which, embraced by the vagina of that side, formed a projection at the upper part of that canal. The partition which ran along the body and neck of the uterus and vagina had the same organization and thickness as the parietes of the uterus.

At each superior angle of the body of that viscus, at the point where the fallopian tubes ought to be inserted, and instead of them there was found an appendix, a real uterine horn, eighteen or twenty lines in length, cylindrical in shape, as large as the little finger where it was inserted into the uterus, swelling out in the middle, and suddenly becoming fine where it terminated in the fallopian tube.

This horn, placed horizontally at the upper part of the broad ligament, presented an oval shaped cavity, three lines in diameter, smooth and even like that of the uterus, communicating freely with its cavity, and also communicating freely at its smaller end with that of the fallopian tube ; its parietes, two lines in thickness, had the same structure as the uterus. Neither the fallopian tube nor the ovaries offered any thing remarkable.—*Journal Hebdomadaire.*

ST. BARTHOLOMEW'S HOSPITAL.

Case in which a Simple Dislocation of the Ankle was rendered Compound by the motion of the limb.

FRANCIS J. B. LANIGAN, a very muscular man, aged 53, was brought into the hospital on the evening of the 27th April, having received severe injury in his right leg whilst in a state of intoxication. The limb presented the following appearances:—Heel rather raised, the sole of the foot turned slightly outwards, internal malleolus projected inwards and forwards. On examination, it was found that the internal lateral

ligament was lacerated, and that the tibia was completely luxated ; the fibula was also found to be fractured about two inches above the joint ; no fracture of the tibia could be detected. The patient being placed on his right side in bed, extension was made, and the foot brought into its proper position ; the limb was then placed between two splints, the upper one extending only about two-thirds down the leg, so as to admit of the application of 12 leeches, and cold lotion after the bleeding had ceased.

28th.—Has passed a restless night, and complains of having suffered much from cramp, to which he states that he is very subject ; the foot is again completely thrown out of position by the violent action of the muscles during the night ; greater difficulty in reducing it was this morning experienced than last night, in consequence of the very irritable state of the muscles ; the limb is now placed between two common splints, extending from the knee to the foot. Some constitutional excitement.

Bled from the arm to $\frac{3}{4}$ xvj. and ordered Calomel gr. iii. Pulv. Jalap. gr. xviii. to be taken immediately.

At the usual hour Mr. Earle visited the patient, and wishing to see the position of the limb, the upper splint was very carefully raised ; but immediately on the pressure being taken off, the dislocation was again violently reproduced by the spasmodic contraction of the muscles. But little difficulty was now experienced in reducing it, and the splints were immediately replaced.

Træ. Opii gtt. xxxv. h. s.

May 1st.—Has been rather restless during the night, complains a little of pain from the tightness of the splints ; the inflammation and swelling have extended a little upwards ; tongue rather furred ; pulse full. At noon Mr. Earle saw the patient, and let out a small collection of matter in front of the ankle by a free incision.

Ordered Hyd. Submur. gr. v. Ant. Tart. gr. ss. statim. A large bread and water poultice to be applied.

4th.—Complains of pain about the inner ankle ; more pus evacuated from the neighbourhood of the internal malleolus by free incisions, and from the outer side over the fracture in the fibula. The patient was now placed on his back, with the limb in a fracture-box, to facilitate the flow of matter. The poultice was again applied.

5th.—Has had a very restless night, and in a fit of delirium made some violent attempts to turn in bed, and to extract his leg from the box, by which the foot has again been displaced, and the tibia thrust through the integuments, which are now in such a sloughy and lacerated state as to render it impossible to retain the parts in proper position.

Mr. Earle, on seeing the patient at noon, advised immediate amputation, which was also recommended by Messrs. Vincent and Lawrence, whom Mr. E. requested to see the patient. To this the patient objected. His general health does not seem to suffer from the increased extent of mischief.

The poultice ordered to be continued.
Træ. Opii 3ss. h. s.

6th.—Has had a pretty good night, and is now tolerably easy. The limb presents much the same appearance as last night.

At noon, the man still refusing to part with his leg, Mr. Earle ordered him to be placed upon one of his bedsteads, when he succeeded in securing perfect quietude of the limb, by binding the foot tightly to the footboard, and applying the nine-tailed bandage. The dressings could now be applied without the slightest risk.

Evening.—States that since his removal he has been easier than at any period since the accident.

Ordered Tr. Opii $\mathfrak{m}\mathfrak{x}\mathfrak{l}$. h. ss.

11th.—Health much the same; but the discharge not having quite so healthy an appearance, a weak solution of the nitrate of silver was ordered to be applied on lint, under the poultice.

12th.—Ordered Sulph. Quininæ gr. ii. bis die.

14th.—The quina was omitted yesterday, in consequence of diarrhœa. Pulse rather weaker.

Ordered Tr. Camph. Compositæ 3j. Infus. Cascarillæ 3iss. bis die. Vini Rubri ʒss. Sago, &c. daily. Pulv. Ipecac. c. gr. x. h. s.

The man consents to lose the limb on Saturday (day after to-morrow), being the usual operating day.

16th.—The patient was conveyed to the theatre, when the operation was performed in the usual manner. Cold cloths were ordered to be kept constantly applied to the stump, and Mr. Earle, before leaving the hospital, requested that the patient might be well watched, as he thought in all probability there would be some hæmorrhage. At half-past four o'clock p.m. there having been slight oozing of blood for some time, the stump was opened, when a good deal of coagulated blood was removed, and two large muscular branches secured; it was now kept open until all fear of hæmorrhage had ceased. The patient complained of no pain.

Continue the cold applications.

17th.—Has had no refreshing sleep, though he dosed a great deal during the night, talking incoherently. The stump looks well, though rather dark coloured.

The bowels have not acted since the operation, and there is some enlargement about the region of the stomach. The pulse is rather weaker; the tongue dry and brown.

At noon Mr. Earle saw the patient, and ordered—

Calom. gr. iii. Opii gr. j. statim. s.

R Ammon. Carb. gr. xiv. Aq. Distil. 3iss. in impetu effervescentiæ cum succ. Limon. recent. coch. j. amp. 6tis horis sumend.

Evening.—Does not complain of any pain. Ordered to take brandy and water ad libitum.

18th.—The external part of the stump presents a gangrenous appearance.

Ordered a large fermenting poultice with yeast.

20th.—The stimulants were continued, but he died at half-past two this morning.

On the Tuesday morning following the operation, the leg was examined in the presence of Mr. Earle and several of the pupils. The whole of the anterior and internal part of the capsule was lacerated, as was also the internal lateral ligament; the posterior inferior edge of the extremity of the tibia (within the capsule) was broken off. This not having been generally described, is probably rare, and may, no doubt, in some degree account for the frequent luxations which took place, and for the great difficulty experienced in retaining the parts in situ. In the fibula there was an oblique fracture, about an inch and a half, or two inches above the joint. The portion of integument in front of the leg, which had a bruised appearance, and required to be dissected back, was the part which became gangrenous; and it was remarked that the minute injection had not passed into the corresponding portion of integument of the amputated leg. The condensation which had taken place, in consequence of inflammation, Mr. E. considered might have diminished the vascularity of the part.

Post mortem examination.—About 13 hours after death the body was examined, when there was found to be no extension of inflammation or gangrene in the stump. The mucous membrane of the air passages was slightly inflamed, and there was an ulcer in the larynx, at the base of the arytenoid cartilages. Nothing else was found apparently connected with death.

This patient had, since his admission into the hospital, and for some time previous, been troubled with a constant cough, which now, since the accident, proved a source of great distress; his voice was thick, and latterly almost unintelligible—for this the morbid appearances in the vocal organs amply account.

ST. GEORGE'S HOSPITAL.

Tubercles of the Lungs, Spleen, &c.—Fluid in the Ventricles of the Brain—Curious symptoms during life.

THE following case excited much interest in the minds of the medical officers of the institution and their élèves, and is calculated to

teach one thing at all events—caution in diagnosis.

William Perryman, a groom, was admitted on the 20th of May, by Dr. Seymour. He complained of severe pain in the loins; and of pain, increased on pressure, midway between the umbilicus and anterior superior spine of the ilium, on the right side. There was frequent vomiting, occasional stoppage of the urine, which was high coloured; tongue clean and moist, pulse 100, bowels not confined.

His aspect was pallid and anxious, his body emaciated, and his debility so great that he almost fainted during the examination in the waiting-room, and was carried at once to bed. He had been ailing, he said, for four months or more, but the symptoms for which he applied to the hospital were only of ten days' duration. For the last two years he had led a regular life, but previous to that his habits had been debauched, and he had always worked hard. His exhausted state precluded our obtaining any better history than the above, though a more complete one would have been desirable.

Dr. Seymour, though not satisfied as to the nature of the case, was inclined to think that a calculus was passing from the right kidney into or along the ureter. He ordered—

Haust. Cetacei c. Tr. Op. \mathfrak{m} xxx. statim.
Sod. Tart. \mathfrak{z} ij. Sod. Carb. \mathfrak{O} ss. Aq.
menth. pip. \mathfrak{z} iss. M. ft. haust. cras
mane sum.

On the 21st, the pain in the loins being severe, he was cupped there to 16 ounces, and took 25 minims of liquor potassæ, with half a drachm of tincture of hyosciamus, in almond mixture, every four hours. He also had an anodyne at night, the enema oliosum, and the effervescing draught when the vomiting was troublesome*.

24th.—Has shooting pains at times in the abdomen, and is inclined to be delirious at nights. The pulse is 100, full, and occasionally intermitting; the tongue moist; urine turbid; bowels open from the injection. No pain in the head or intolerantia lucis, but now and then a little numbness in the thighs. There is some cough without expectoration; *he inspires fully and freely without pain.*

Rep. Omnia. V.S. ad \mathfrak{z} x. Baln. tepid.
Ol. Ricini \mathfrak{z} vi. cras mane.

By the 26th a considerable change in the symptoms had occurred: the pain, which before was chiefly in the flank, had shifted round to the epigastrium, and was quite excruciating when pressure was made on the scrobiculus cordis; there was tenderness,

however, on pressure, in other parts of the abdomen, though by no means so severe as in the above-mentioned spot. The belly was not tense, nor was there much pain independent of pressure. The evacuations from the bowels were abundant, natural, and of excellent colour; pulse 90, and intermitting; tongue dryish, and rough in the centre; countenance anxious, expression vacant. He had not vomited since the night of the 25th.

Dr. Seymour now believed that the mucous membrane of the stomach was inflamed, and ordered 24 leeches, and afterwards a fomentation, to be applied to the scrobiculus cordis. By these means the intensity of the pain was relieved, but the patient was very delirious in the night; and at eight A.M. of the 27th was observed to be much convulsed, and insensible to what was going on about him. At Dr. Seymour's visit (noon) the pupils were dilated; he evinced a sense of pain when pressure was made on the epigastrium; the pulse was 90, regular, and of tolerable strength; the bowels not opened; countenance sunk.

V.S. ad \mathfrak{z} xvi. Enema statim Emp. Canth.
epigast. Lot. Spt. capiti raso.

Five P.M.—Lying in a perfectly insensible state; pupils dilated and eyes upturned; some degree of stertor; frequent convulsive motions of the hands and arms; no pain apparently on pressing the epigastrium; pulse quick and jerky, but not full; bowels opened by enema. He has been quieter since the bleeding, and the last portion of blood abstracted exhibits the buffy coat.

It seems that ten or eleven years ago he received a blow upon the head, which stunned him for an hour, and affected him considerably for several days.

This fact, together with the evident symptoms of pressure on the brain under which the patient was now unequivocally labouring, induced many to conjecture that the vomiting, &c. were rather referable to the head than the abdomen.

The patient gradually sunk, and expired soon after midnight.

Sectio Cadaveris.—The body generally was much emaciated.

Abdomen.—The peritoneum covering the viscera and abdominal parietes was free from inflammation. The stomach was laid open, and its mucous membrane found to be also free from inflammation. The spleen was attached to the diaphragm more closely than usual, and slight flakes of recent lymph were observed on the contiguous surfaces of each. In the substance of the spleen were a certain number of tubercular deposits, mostly about the size of peas, circular, well defined, and each made up of a sort of cyst, with firm walls, containing very “laudable” pus in the centre. On the splenic surface of the diaphragm were many small miliary deposits, apparently tubercular, and resembling those

* We would particularly remark, that at this time there were none of what are commonly called “head symptoms,” for the functions of the brain appeared to be perfectly exercised.

in the spleen itself, save that they contained neither central cavity nor pus. The liver was not healthy; it presented a number of granules of a lighter colour than the neighbouring parenchyma, besides which were some small deposits like those already described. The kidneys were healthy, with the exception that in them also were a few, and but a few, tubercular granules, having the size and appearance of mustard seeds.

Thorax.—The lungs externally appeared to be sound, but the section of their upper lobes, especially of the left, shewed that they were full of tubercles, closely resembling those in the spleen; the tubercles, however, were crude, not having yet run into suppuration. The heart and great vessels shewed nothing unusual.

Cranium.—There was not the least fluid between the tunica arachnoides and pia mater; the veins of the latter were rather full. No red or black points were seen upon slicing the brain, which was rather soft, particularly at the septum lucidum and fornix. Six drachms, or thereabouts, of clear fluid, were found in the lateral ventricles; and a cloudy appearance about the arachnoid covering the tuber annulare. No abscess or other disease were detected on thoroughly cutting up the cerebrum and cerebellum.

Spine.—The upper and posterior part of the medulla was thought to be softer than usual. A good deal of clear fluid was found between the membranes, and the arachnoid tunic was not quite transparent, but apparently somewhat thickened.

If the appearances presented on opening the body prove that none were right in their diagnostic conjectures during life, they also prove that an accurate opinion would have been little short of a miracle. How the pain in the loins and right iliac region, and the exquisite tenderness at the scrobiculus cordis, are explained or explainable, by what was found after death, we leave to our readers to determine. That all was produced by the tubercles in the spleen, we do not, for own parts, believe; but others, perhaps, who have more experience or more faith, may not feel an equal difficulty.

In an interesting clinical lecture delivered on the case by Dr. Seymour, he appeared to consider the vomiting as depending in some degree on the tuberculated state of the peritoneum investing the diaphragm next the convex surface of the spleen. In support of this opinion (which he only threw out as a hint), Dr. S. adverted to some curious cases of tuberculated peritoneum, in which the prominent symptom had been obstinate vomiting.

Δ.

RECOVERY FROM DROWNING.

To the Editor of the London Medical Gazette.

SIR,

A FRIEND having handed me the Gazette of the 30th May, in which is a statement of the case of Abigail Kenny, by J. Baker, Esq. and as some part of his observations seem to imply that proper means had not been used previous to his arrival, I think you cannot in justice refuse to insert my statement of the case, the truth of which can be attested by the two men who took the woman out of the water, and by several other persons.

When the woman was brought into my house *she was not insensible*, but drank with avidity some brandy and water which I gave to her. I then proceeded, according to the rules of the Humane Society, to strip off the wet clothes, &c. &c. and upon putting her feet in water, she cried out, in consequence of its being too warm for her to bear, from which circumstance you may judge what wonderful exertions were subsequently necessary to restore her to animation. After the brandy and water was given her, she vomited, and was fast recovering before J. Baker, Esq. arrived; she, however, appeared much exhausted, probably occasioned by want of food, and continued to groan for a long time. The medical attendant, in order to restore her, bled her in the arm, and afterwards in the neck, which method of treatment, by the bye, I do not find in the instructions of the Royal Humane Society, nor has he had the candour to mention them in his statement.

I should not have thought it worth while to notice the circumstance, but that J. Baker, Esq. has taken all the merit to himself, not having even deigned to hint that I was in any degree a party to the transaction, either in the way before mentioned, or by providing the woman with spirits, a comfortable bed, food, &c. till next morning, without any remuneration.—I am, Sir, yours respectfully,
J. CLAPPERTON.

Tiger Inn, New North Road, Islington.

P.S. J. Baker, Esq. called next morning to bleed the poor woman again, but seeing her so exhausted, he declined it, or he might again have had to use “the means recommended by the Humane Society for an hour and a half,” or perhaps longer!

ERRATA.

In our last number, Case VI. page 21, ought to have been headed “Art. XIV. Case on the Ergot of Rye, by George Waldron, of Bath.” The notice of the case, as it now stands under Art. XIV. is incorrect.

Page 21, for Mr. Waldren, read Mr. Waldron.

W. WILSON, Printer, 57, Skinner-Street, London.

THE LONDON MEDICAL GAZETTE,

BEING A
WEEKLY JOURNAL

OF
Medicine and the Collateral Sciences.

SATURDAY, JUNE 20, 1829.

ON THE
INFLAMMATORY AFFECTIONS OF
THE BRAIN AND ITS MEMBRANES.

*Being the Substance of the Croonian Lectures,
delivered before the Royal College of Physicians,
in May 1829,*

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LECTURE I.

IN the present lectures I propose to continue the observations which I had the honour of addressing last year to the College, on the subject of the diseases of the brain and nervous system.

Of the problems which require solution in our conjectural art, and of the difficulties which occur in practice, there are none which have caused more anxiety to myself (as they have some, I presume, to others) than such as are connected with symptoms which appear to be referable to the head. I say *appear*, because the difficulty consists in determining whether the symptoms to which I allude really indicate disease within the head, or whether they should rather be referred to the affections of distant organs; whether they emanate from the brain, as rays of light from a body which is itself ignited, or whether they resemble rays reflected from a polished surface; whether, in short, they are the direct effects of a primary disease of the encephalon, or whether the indirect, the adopted offspring of nervous sympathy.

For instance, a patient may have pain in the head, or giddiness, or numbness of the extremities, or dimness of vision, or various depraved sensations. Now these are the early symptoms of

tumors slowly developing themselves within the cranium; or of chronic inflammation of the brain or its membranes, which may lead to a fatal effusion, or to thickening of the membranes, or to softening of the cerebral substance. But one or all of these symptoms may spring from a disordered stomach. Is it not often, therefore, a matter of the utmost difficulty to determine whether the patient is only dyspeptic, or whether he will not soon be found to labour under a much more serious malady?

With respect to the first of these symptoms—*pain in the head*. After we have set aside the commoner kinds of head-ache, the nature and origin of which are sufficiently understood, there will still remain certain forms of this complaint, of an obstinate and intractable nature, of which it will be exceedingly difficult to say whether they should be referred to nervous sympathy or to primary disease of the brain. Nay, it will sometimes be doubtful whether they arise from any internal organ, or whether they should not rather be referred to the pericranium, or to the nerves of the scalp. To cite an instance of such ambiguity, a gentleman (a clergyman), of middle age, who had frequently been subject to rheumatism, and not, as it was supposed, to any other complaint, was troubled also with pain in the head, severe in its character and obstinate in its continuance. This head-ache was attributed by the physicians whom he consulted, both at the University and in London, to a rheumatic affection of the pericranium, and was not thought to indicate internal disease until the occurrence of fits, of an epileptic character, disclosed

the real nature of the complaint. This patient died last year of apoplexy, and the membranes of the brain were found to be greatly thickened, together with a considerable serous effusion.

Of *giddiness*, it may perhaps be said that it is a surer sign than head-ache of internal disease, or at least of a disordered state of the cerebral circulation. But the same symptom may so often arise from sympathies with the stomach, uterus, rectum—or may exist, or at least appear to exist, as an indication of debility alone, that it must be allowed to be a sign which is far from being decisive.

An occasional sense of *numbness* in the extremities is a symptom, not only of cerebral disease, but also of nervous sympathy, which may be excited by congestion in the liver, by abdominal tumors, by constipation, and various other causes. When felt, therefore, occasionally, and to a slight extent, this symptom does not necessarily create alarm. In a case which I had lately an opportunity of observing, a gentleman was subject to this sensation, or rather loss of sensation, in a remarkable degree: but as he was of a bilious and dyspeptic habit, insomuch that he could not recollect any period of his life in which his bowels had ever performed their office unsolicited by the daily use of medicine, the numbness of which he complained was attributed to the torpid state of his liver. It was succeeded, however, by a paralytic seizure, which slightly distorted his features: but he apparently recovered, and more than one physician whom he consulted, in the West of England, still laid the whole fault upon the liver. Nor was the existence of cerebral disease, although it might be suspected, yet sufficiently ascertained, or guarded against, until it was disclosed too late, by sudden and fatal apoplexy.

It is well known that sympathy with the nerves of the digestive organs will give rise to various affections of *vision*, from the slightest dimness up to temporary amaurosis; from the occasional appearance of a luminous spot, up to that of forms and spectra, which are shaped by the imagination into distinct apparitions. It is difficult, therefore, to arrive at any certain conclusion with respect to the existence of cerebral disease, from the indications afforded by the organ of vision; and numerous

cases of affections of the optic nerves have been considered as only sympathetic, which, in fact, were symptoms of disease acting at once on the origin of those nerves in the brain. A gentleman came to town about two years ago, on discovering suddenly, with surprise and alarm, that the sight of one eye had utterly failed him. He consulted all the oculists and surgeons chiefly celebrated for the treatment of such cases, and most of them were of opinion that this partial defect of vision was purely sympathetic, and would be removed by the use of senna and blue pill; and, in fact, it was to a certain extent removed: but as he died soon afterwards, in Ireland, with the symptoms, as I have been informed, of disease of the brain, and as he inherited, and himself evinced a tendency to cerebral disorder, which appeared to be hereditary (his mother being at this moment afflicted with hemiplegia), I think there can be little doubt that his temporary loss of sight was a symptom, not merely, as it was supposed, of dyspepsia, but of a morbid state then existing in the brain. In a recent case of paralysis, the occurrence and fatal termination of which the friends of science every where deplore, it appeared, from the result, that a singular affection of the optic nerves, which had previously been attributed to derangement of the stomach, indicated with too much truth the existence of irritation, or pressure, affecting the origin of one of those nerves.

The remarks which have been made respecting the ambiguity of signs derived from the eye, may be extended to the other organs of sense. Tinnitus aurium is usually considered a nervous or sympathetic sensation, but it may also be caused by inflammation, or organic lesion, existing within the cranium: and, in cases of severe and continued ear-ache, it is often doubtful whether the seat of pain and inflammation be external to the bone, or whether the bone itself be diseased, or even suppuration established within it.

I am at present acquainted with a gentleman who has for some years entirely lost the sense of smell, and partially that of taste; but various have been the opinions given him, as to whether these symptoms, and other more transient affections of the muscular and sensitive organs to which he is subject, are the result of a constitutional

irritability of the nervous system, or whether they are the consequences of a fall which he sustained some years ago, which immediately produced the symptoms of concussion of the brain, and appears to have left him subject to seizures almost of an epileptic character.

Nor can we, in all cases, rely with confidence upon the indications drawn from the state of the *intellectual functions*. The line which separates hypochondriasis from mania cannot always be distinctly traced; and as the symptoms of the former are generally admitted to proceed from derangement of the abdominal viscera, it would not always be safe to infer the existence of a morbid condition of the brain itself from an apparently disturbed state of the intellectual functions.

If it be argued that single symptoms must always be ambiguous, and that our judgment of any case must be formed, not from any separate symptom, but from the whole collectively, yet I contend that it is more difficult accurately to distinguish diseases of the brain than those of other organs, in consequence of the universal relations which it bears to all other parts of the frame, and from the want of any sign which can be considered decisive until the disorder has proceeded so far as to produce fatal, or at least irreparable mischief. Again, it may be urged that our practice must proceed upon general grounds, and that we must determine whether depletion, or tonics, or purgatives are requisite, rather from a reference to existing symptoms than from nice distinctions and pathological refinements; and that, in doubtful cases, we may generally attain our end by pursuing a middle course—namely, by combining a due attention to the natural functions, together with measures calculated to relieve or guard against an excited state of the circulation in the cerebral organs: yet it must be allowed that the simplicity, steadiness, and certainty of our practice, will be greatly increased by founding it upon a just pathology; and that the more rational it becomes, the more directly will it arrive at its desired purpose. And in respect of the prognosis which we are enabled to form, and the opinion which we are justified in giving to the friends of the patient, it will be of infinite consequence to decide whether the abdo-

minal viscera or cerebral organs are primarily affected.

The remarks which have now been made may appear to be trite or tedious, but I have hazarded them nevertheless, for the sake of recalling to the minds of those who are already, as I am well aware, acquainted with the subject, a sense of the obscurity in which the early symptoms of cerebral affections are involved; in order that they may be the more inclined to admit that attempts to clear up that obscurity, and to estimate the true value and meaning of the signs by which those affections may be recognized in their nascent state, and more insidious forms, are not expended upon a subject which is already exhausted; and that, however such attempts may fall short of their mark, they at least are aimed in a right direction.

The importance, or rather necessity, of recognizing disorders of the head in their *early* stage, is obvious from the consideration that they can then alone be attacked with any chance of success. In acute cases the period is brief indeed in which the power of art is available; in no other disorders is the adage “*ocasio præceps*” more fearfully true, or more frequently exemplified. But, whether the case be acute or chronic, it is only in the early stage that its precise nature admits of being distinguished with accuracy. In its further progress, from the extensive sympathies of the brain with all parts of the body, so many functions become implicated, and so various are the symptoms which arise, as to preclude arrangement or classification, and defy the art of diagnosis. The aid which in most other cases the sensations of the patient are capable of affording us, is lost to us too soon in disorders of the head; until in their advanced state they all resemble one another, and present alike a dreary abolition of the powers of animal life. The period, therefore, is highly precious in which these affections admit of being distinguished with precision, or treated with any hope of advantage.

First in the list of the maladies of the head, *Inflammation* of one or more of the textures contained within the cranium must naturally attract our notice. And as it is first in the order of the phenomena which occur in most of those maladies, so may it be considered as the most important in its consequences; being, in fact, the source and

origin of the events which subsequently take place. For, without adopting to their full extent the notions of the *Broussaists*, yet it must be allowed that *inflammatory action, or something exceedingly similar to it, precedes the development of all accidental formations*. Inflammation, then, being the first, the most important of morbid processes, it is fortunate that it is also the one which it is most within the power of art to control: except, indeed, in those cases in which the violence of its first onset immediately destroys life; or when the constitution is unable to support the remedies necessary to subdue it; and provided its approaches, when it steals on silently and imperceptibly, are timely discovered, and duly guarded against.

Certainly the pathologists of the present day cannot be considered deficient in their attention to the subject of inflammation. It is a subject which has gradually occupied a larger and a larger space in the chart of nosology: and as the discoveries of modern chemistry seemed likely to resolve every substance into metallic elements, so have certain ultra-pathologists gone near to maintaining that inflammation, acute or chronic, is the source of every disease. But these theorists have as usual generalized too fast, and with a rash impatience, like that of infidels in religion, have attempted to reject every thing which they cannot understand. Not that we are in reality better acquainted with the ultimate nature of those morbid actions to which they attribute the production of disease: it is only that in these the process may be traced a few steps further, or rather that their effects are cognizable by our senses.

Affecting thus to understand the nature of disease, there are some who can see nothing but inflammation in every fever, and every disorder of the nervous system. Were the case so, the theory of medicine would indeed be simplified, and its practice facilitated. But the hypothesis is disproved by the very circumstance which recommended its adoption. For inflammation, or its effects being visible to the sight, the supporters of the doctrines alluded to have failed to shew that fever consists essentially in inflammation of the brain, or of the abdominal viscera, or that every nervous disorder arises from a local cause. The sanguiferous and nervous systems are indeed intimately connected, and act

and re-act upon each other in a wonderful manner. “*Scilicet organa quæ sanguinem movent tantum cum cerebro commercium habent, et sanguinis motus, ad excitandum, suisque muneribus aptandum cerebrum, adeo necessarius est, ut hæ binæ functiones subsidium ferant et petant vicissim, neque altera sine alterius ope perfici queat.*”

But so far from its being true that there can be no constitutional disorder without local vascular excitement, it is, I believe, the more common course in fever, that the cerebral or nervous functions are first deranged, and that local inflammation, especially in the mucous membranes, is excited by the agency of the nerves.

Nevertheless, much practical good has been derived from the attention which has been paid to the subject of inflammation. However some may err by attributing to it a more extensive part than it really plays in the production of disease, and however much we may fall short of understanding its intimate nature and proximate cause, yet our knowledge has undoubtedly been improved of the general laws by which it is regulated, of the effects to which it gives rise, and of the modifications to which, from a variety of causes, it is subjected. Of these modifying causes the most important would seem to depend upon the structure of the part affected; and hence, in exact accordance with the classifications established in general anatomy, we perceive that the train of symptoms attending inflammation varies according as the inflammation is situated in the serous, mucous, or fibrous membranes, in the cellular texture, or in the cutis vera; and further, that general rules, subject of course to some exceptions, but serving, nevertheless, as useful guides to practice, may be laid down for the treatment of these different varieties of inflammation.

It is probable that the principle of this distinction may be applied with greater accuracy than has hitherto been attempted to the elucidation of the *nature and treatment of inflammatory affections of the Brain and its Membranes*. If we could with certainty, at the commencement of the attack, distinguish inflammation of the membranes of the brain from that of its substance, we should be able to call general principles in aid of our practice, instead of depending *solely* upon information drawn

from the apparent urgency of the existing symptoms—information which is transitory at best, and often illusive. Let us, therefore, inquire how far particular symptoms have been found to indicate inflammation of particular parts or of distinct textures within the cranium.

At the outset of our proposed inquiry, I would assume that inflammation of the membranes is marked by a greater intensity of symptoms than that of the substance of the brain; that it is, for the most part, distinguished by symptoms of irritation rather than of pressure; by convulsions and spasms, rather than by paralysis or coma: but that it is more especially distinguished by the delirium which it causes, the reason of which we shall see in the sequel. By some pathologists it has been alleged, that the symptoms attributed to arachnitis belong in truth to encephalitis, for that inflammation of the membranes produces that of the brain itself. It is, indeed, true that inflammation of the membranes cannot long continue without being extended by contiguous sympathy to the brain. But this inquiry is intended chiefly to ascertain the symptoms which attend the commencement of the attack, the period at which it is most important to distinguish them. Moreover, if it should prove that when inflammation has been extended to the substance of the brain, the primary affection having commenced in the membranes, the symptoms are to a certain extent modified, and different from those which attend a primary inflammation of the brain itself, it is surely requisite that we should be acquainted with this modification of the symptoms. If arachnitis be attended and succeeded by a distinct train of symptoms, whether we attribute them to inflammation of the brain, or to that of its membranes, we ought at least to be able to recognize them. In fact, when inflammation of the brain is produced by that of the membranes, it is always general, affecting the whole substance, and productive, therefore, of general symptoms. Whereas, on the contrary, primary encephalitis affects only a portion of the brain, and is distinguished therefore by local symptoms, and especially by partial palsy.

[To be continued.]

ON

DEFORMITIES OF THE CHEST.

BY WILLIAM COULSON,

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It is not my intention in this communication to treat of those deformities of the chest which are consequent on affections of the lungs or of the spinal column, but to confine myself to the consideration of two kinds, in which the spine and the viscera of the chest are only secondarily affected.

In the first of these the sternum is prominent, and the sides of the chest are flattened; in the second, the sternum is depressed, or concave in front, and the lateral parietes of the chest more convex than natural.

I.—My attention was directed to the first of these deformities by the valuable paper of Baron Dupuytren*; since the publication of which, in March 1825, I have met with five cases of the kind in my own practice.

The sides of the chest are very much flattened, one side being sometimes more depressed than the other; the sternum projects in some cases like the breast of a pigeon, from which circumstance persons with this deformity are called *pigeon-breasted*. The sternum, however, is not always so prominent as it at first sight appears to be, the prominence being formed by the sternal extremities of the ribs, and the sternum itself being either flat or a little concave at its lower, and projecting at its upper part. The transverse diameter of the chest is of course considerably lessened, whilst the antero-posterior and vertical ones are increased. There is always some alteration in the natural direction of the spinal column, there being either a lateral curvature, which I believe most common, or a projection of the spine backwards.

When it is considered how very unfavorable this contracted state of the chest is to the proper development and exercise of the organs contained within it, it is but natural to expect that their functions will be deranged. The extent of this derangement will in a great degree depend on the extent of the deformity. The breathing is quick, and

* *Répertoire d'Anatomie*, tom. v. p. 198.

often difficult, being generally performed through the mouth, the nostrils appearing as if they were plugged up; the circulation is hurried, and, from the depression of the side of the chest, the heart may be seen strongly pulsating against the ribs. The speech is not strong, nor can persons with this deformity speak for any length of time continuously; the hearing is slightly affected, and the tonsils generally enlarged. The enlargement of the tonsils in some of the cases which fell under Baron Dupuytren's observation, was so great as to compel him to remove a portion of them; and in one of my own patients, at this present time, the tonsils are so much enlarged as to prevent me seeing any part of the back of the pharynx. I have not yet had an opportunity of seeing this deformity in an infant, but the author whom I have just quoted states that there is great difficulty in taking the breast, and that if the nipple be retained long in the mouth, the infant is in danger of being suffocated. A very peculiar symptom in this deformity is the noise which children make during sleep. The mother of one of the children with this deformity told me that the screams and noise of her child when sleeping were such as to disturb the whole family. The breathing is very loud in the sleep: the children frequently start up in the bed, and have unpleasant dreams.

The deformity is sometimes congenital; at others, however, it occurs during childhood; but in most cases the subjects of it are of a weak constitution. If no attempt be made to remedy the deformity at an age when the bones are in a pliant state, the patient sooner or later falls a sacrifice to some disease of the lungs or heart, produced or excited by the constant functional derangement to which these organs have been subject. I opened the body of a person in my neighbourhood, about twenty-four years of age, who was pigeon-breasted; he had from his early youth been subject to affections of the chest, and died at last from hæmoptysis. The lungs, on examination, were found extensively diseased. This is the only opportunity which I have had of making a post-mortem inspection of the kind; but M. Breschet*, who has examined the bodies of several persons

with this deformity, found the whole osseous system weak, and imperfectly developed; the lungs depressed at the spots corresponding to the depressions of the thorax, and posteriorly having the impressions of the ribs strongly marked on them.

I shall defer speaking of the treatment and causes of this until I have considered the next kind of deformity.

II.—The external appearances of the chest in this second kind of deformity are directly the reverse of those which we have just been considering. The sternum is hollow, or concave anteriorly; the sides of the chest are very prominent; and the spinal column but slightly, if in any degree altered from its natural shape. This is not so frequently congenital as the former kind, but frequently occurs in persons of a weak habit, who are narrow-chested, and stoop a good deal. The constitutional symptoms which attend this kind of deformity are not so severe as those which attend the other. The breathing is generally short and quick; the circulation hurried. In both kinds the patient is generally subject to cough, or chronic catarrh. My friend and colleague, Dr. Lambe, told me that a patient of his, in whom this depression, or hollow state of the sternum existed, died this year of a pulmonary affection. The sinking in of the sternum in this case was the consequence of the pulmonary affection, or rather weakened state of the circulation, because for upwards of fifteen years he had been subject to these attacks, and the sinking in of the sternum had only come on during the last three years. Although the constitutional symptoms be not so severe, still it is of the highest importance to attend to the removal of this deformity, as its existence predisposes the patient to pulmonary attacks.

The occurrence of both these deformities depends, I believe, in most cases on a weak and languid state of the circulation. The constitutions of those in whom they are met with, and the state of the osseous system, as developed by dissection, strengthen this opinion.

Although this be the most frequent cause of these deformities, they both require for their treatment local as well as constitutional means. For the prominent sternum, and lateral depression of the chest, I have tried the plan recommended by Baron Dupuytren with

* *Répertoire d'Anatomie*, tom. v. p. 204.

success. The most important part of the local treatment is the application of pressure to the chest. The child should be placed against the wall, or laid on the floor or table, and the hand should be pressed against the sternum; and, as Baron D. very properly observes, the pressure should be made during expiration and suspended during inspiration, a tact which may be easily acquired. The pressure should be made frequently during the day, and be kept up for a few minutes at each time. In addition to this, if the child be sufficiently old or strong, all those exercises should be used which have a tendency to expand the chest. The muscles, by the action of which we endeavour to effect this, are the two large serrated and pectoral muscles. The child should stand erect, and carry the arms as far backwards as it can. The use of the dumb-bells is a good exercise; any exercise, indeed, is good by which the scapulæ are approximated towards each other, and the arms carried backwards. By these means, if properly persevered in, the chest returns to its natural shape, and the whole system becomes invigorated.

The chief difficulty which the practitioner has to struggle with in the treatment of this deformity is that of impressing on the minds of parents the absolute necessity of perseverance in the use of pressure, and of disposing them to continue with sufficient assiduity a process of which the results cannot for some time be visible. When we must trust to hired nurses, the difficulty, I fear, would be almost insuperable.

In the second kind of deformity local pressure will also be found indispensably necessary, but made in a different direction than in the former case. In the first kind of deformity it must be made from before backwards, in this from side to side. The child or patient must be placed with one side against the wall; and pressure be made either with the hand or knee against the prominent part of the opposite side, from below upwards. By pressing the ribs upwards we tilt the sternum forwards, and in some degree imitate the natural action of the parts. The pressure should be made during expiration and suspended during inspiration, as in the former case. Parents are frequently astonished to see the degree of pressure which can be kept up without produc-

ing any inconvenience. Those exercises, also, are proper by which the large pectoral muscles are exerted. We not unfrequently see this hollowness of the sternum in adults who stoop. I advise, in addition to pressure, that whenever they have leisure, they carry the arms back, at right angles to the body, as far as they can; and to desist, as much as possible, from stooping. I have tried this plan in some milder cases with success; and I think there are but few cases in which we need despair of success. I entertain, however, a different opinion respecting the pigeon-breast; and fear that in adults we shall experience great difficulty in restoring the breast to its natural shape. In this deformity the osseous portion of the rib is the part to be acted upon; in the other, more the cartilaginous part.

The constitutional remedies for both deformities are the same. We must strengthen the system by doses of quinine, proportioned to the age of the patient; exhibit alteratives, as the *hydrargyrus cum cretâ*, and *pulv. rhœi.*; order nutritious diet, and exercise in the open air, and attend to the clothing. In short, all those means by which the system can be kept up are, generally speaking, proper in these cases. Circumstances may arise in the treatment of these cases when it may be injudicious to resort to the means which I have mentioned, but these must be left to the discretion of the practitioner.

I will now give three cases of the first kind of deformity: in the first the means which I recommended have not been tried, or only to a very imperfect extent; in the second the remedies were persevered in for several months, and with marked benefit. I regret, however, to say that when I looked at the breast of this child four months ago, it was much flatter than it is at present. I find that the means have been omitted since that period. Unless the pressure be continued for a long time after the chest has been restored to its natural shape, the deformity is likely to recur. In the third the cure is complete.

CASE I.—William Henry Powell, æt. 6 years, of a weak and delicate constitution, applied at the General Dispensary, May 7th, 1828, for a complaint of his chest. His mother states that the child had a fine natural breast when born, but when seven months old she

perceived the form of the chest begin to alter, and from that time to this it has been gradually attaining its present shape. The sternum appears at first view very prominent; but on a careful examination the sternal extremities of the ribs project most, the sternum not being so much altered in direction. The sides of the chest very much depressed, particularly the right side. Slight lateral curvature of the spine. The child's breathing is not very quick or difficult when awake, but it breathes through the mouth, and the nose appears as if it were plugged up. The tonsils are very much enlarged. During sleep the breathing is very laborious, and the child is constantly making a dreadful noise. Unwilling to trust to the assertions of the parents, I convinced myself of the fact by being present when he was asleep. The noise was very peculiar; the breathing appeared for a moment to be suspended, and then to be resumed with a rattling noise. He frequently starts up in his sleep, and makes various exclamations. The boy has a cough, and is a little deaf. The mother gives the child a decoction of rue and savine, of sufficient strength to keep the bowels open, by which he appears to be benefitted. I advised the pressure, and the exercises which I have enumerated; they were partially tried, but the parents being too indolent or inattentive to persevere with the treatment, the child continues at present (June 8th) nearly in the same state as when I first saw him.

He resides at No. 10, Pump Court, Moor-lane, Cripplegate. I have given a lateral view of the chest.

CASE II.—Master William N. æt. 5 years, of a weak and delicate habit, residing at No. 16, Aldersgate Street, was brought to me, May 5, 1828, for *tinea capitis*. Perceiving that the child breathed with difficulty, I inquired the reason, and desired to look at the chest. On examination, I found both sides of the chest very much depressed; the sternum prominent, particularly at its upper part; the lower portion was slightly concave. The child was born with a broad chest, but after the first year it began to assume its present shape. The breathing is quick and short; the nostrils appear as if they were plugged up; and the child breathes

through the mouth. During sleep he struggles a good deal, rises up in the bed, and after making a great noise, recovers himself. The noise is so loud and distressing to the mother as frequently to prevent her sleeping. The tonsils are enlarged, and the child has a frequent running at the nose.

I pointed out to the parents, who are intelligent persons, the cause of the difficulty of the breathing, and the other symptoms; and assured them that if they would apply pressure to the chest, and induce the child to take certain kinds of exercise, which I enumerated, that the chest would resume its natural shape, and the symptoms disappear. They immediately consented; the child was laid on the floor, or table, and pressed by the mother for five minutes, or more, repeatedly during the day. The dumb-bells were employed a good deal; and another exercise was tried, which I have not before mentioned, since with young children accidents are likely to attend its use. A rope is passed through a pulley, fastened to the ceiling; at one end a weight is attached, at the other a transverse pole; the child seizes this, and alternately raises and lowers the weight. The constitutional remedies which I have enumerated were also employed. These means were steadily persevered in for several months. The state of the breathing soon mended, as well as the health of the child; and the chest began to resume its natural shape. Since the means have been discontinued, the deformity has begun to return.

CASE III.—John William Rivers, æt. 16, thin and emaciated, applied at the General Dispensary, June 9th, 1828, for an affection of his chest. States that he has great difficulty of breathing, particularly on making any exertion; palpitation of the heart; sensation of choking; and very unpleasant dreams. He starts up in his sleep, and makes a very curious noise, the respiration being, as in the former case, for a moment suspended, and then resumed with a rattling noise. The tonsils are enlarged; he is slightly deaf, and has a cough. On examination, I found both sides of the chest very much depressed; the sternum very prominent at its upper, but a little concave at its lower part. The pulsations of the heart to be seen very strong against the side of

the chest. Lateral curvature of the spine. The mother told me that her son was born with a flat chest, and was strong and healthy up to his fourteenth year, at which time he was apprenticed to a tailor. Soon afterwards the complaint began to make its appearance. It was so evident that the great confinement had destroyed the boy's health, and produced this state of constitution, that I ordered him to quit the business, without which no mode of treatment would be availing. After reference of the case, by the master, to a magistrate, the boy was released from his apprenticeship. I then advised pressure, dumb-bells, and the other exercises, and gave quinine internally. My directions were attended to. In the space of a month the shape of the chest began to improve; the breathing was easier; and at the end of four months he was cured. He is now (June 13th) robust, and in good health; and the chest nearly as flat as natural. He resides at No. 3, Crown Court, Golden Lane, Cripplegate.

I have given a front view of the hollow sternum, cases illustrative of which I shall publish at another opportunity.

There is another deformity of the chest well deserving the attention of medical men, produced by too tight lacing of the stays; in which the chest, instead of having the shape of a truncated cone, is somewhat of an ovoid form, narrow at its extremities, and expanded in the centre. The whole class, indeed, of deformities of the chest affords an extensive and interesting field for pathological investigation; for by whatever cause the natural dimensions of the chest become altered, whether from disease of the lungs, of the spine, distention of the abdomen, mechanical compression, or those deformities which form the subject of this communication, the natural action of the organs contained within the cavity must be more or less deranged, and the health of the individual ultimately affected. Some of these are capable of being cured by a combination of mechanical and constitutional means; in others, however, it is obvious that no attempt should be made to resort to pressure, or any mechanical contrivance.

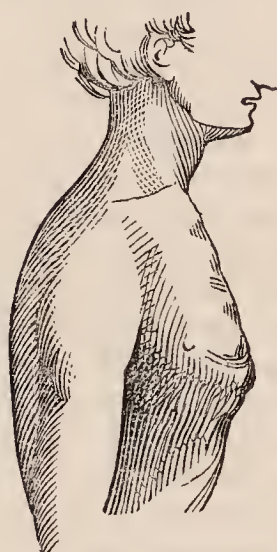
In those malformations on which I have particularly dwelt, I have endeavoured to point out the principle on

which pressure may be successfully applied; but I am perfectly aware that even in this class of cases our expectations may be frustrated by the co-existence of disease of the lungs. It is, indeed, of the highest importance first to ascertain whether disease be present, because in that case it would become a matter for consideration whether the treatment should be adopted or not.

It will afford me much satisfaction, if by means of this communication, I should succeed in directing the attention of my professional brethren to this class of cases. Respecting the kind of deformity first noticed, I have done little more than added my humble testimony to the accuracy with which Baron Dupuytren has described it, and to the merits of the plan which he has recommended. With regard to the other kind, I have trusted entirely to my own observations, not being aware that it has been before particularly noticed, or my mode of treatment been suggested.

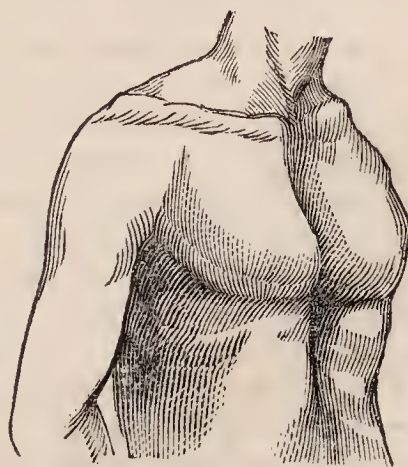
PROMINENT STERNUM.

Lateral View.



WILLIAM HENRY POWELL.

HOLLOW STERNUM.



Mr. ———, æt. 29.

ABSTRACT OF A CLINICAL LECTURE

ON

FRACTURES OF THE THIGH,

Delivered at Guy's Hospital, June 10th,

By C. A. KEY, Esq.

—

CASE I.—Sam. Hallin, æt. 35, a stout healthy man, fell (April 28) from a haystack 20 feet high, and broke his thigh about two inches below the trochanter minor. The exact direction in which the fracture had taken place was difficult to ascertain, on account of the extreme swelling of the whole limb, which rendered it impossible to feel the bone; but subsequent examination led to the belief that the fracture inclined from before downwards and backwards. Placed on a double-inclined plane (M'Intyre's splint), with an arm piece, and three short splints, fastened with straps and buckles. He has maintained the same position for six weeks, and now (June 17th) firm union has taken place, with no perceptible shortening; and the line of fracture can scarcely be traced.

CASE II.—Thomas Grant, æt. 35, tripped over a man's leg, and fell with great force to the ground, the left leg being twisted under the right, and when he attempted to rise, found the left thigh broken just above the knee joint. When he was admitted, the knee joint was much swollen from synovial effusion, and crepitus could be felt by moving the condyles in one hand and the femur in the other. The question was, whether the fracture extended into the joint between the condyles, or whether the fracture had passed nearly transversely across the bone just above the condyles, so as to open the synovial cavity. Mr. K. was inclined to the latter opinion, from not being able, by moving the condyles laterally, to produce crepitus; and from the shaft of the femur being inclined to pass into the ham. The principal feature in the case was the extreme injury done to the knee joint and to the surrounding parts, producing as a consequence great tension and œdema of the whole limb below the fracture, which did not subside until after several applications of

leeches to the seat of the injury, and cold embrocations. The position maintained in this case was similar to that of the former case, with the addition of the axilla piece, though the fracture was so low down as to enable the surgeon to dispense with it, sufficient extension being kept up by the double-inclined plane alone.

CASE III.—An elderly man was admitted under Mr. K. with a fractured thigh, on 5th June, with great displacement of the fractured extremities of the bone. The bone was broken about the middle, the upper portion being forced outwards into the vastus externus muscle, and the line of fracture being oblique. The man was placed on the same apparatus, with the arm piece, by Mr. Elliott and Mr. Hardy, dressers, and with the short splints and straps, as in the other cases. The patient is a very restless man, and with difficulty made to obey orders. On the 11th the limb was examined, and found to lie in an excellent position, the ends of the bone maintaining the line in which they had been placed.

CASE IV.—Samuel Dandy, a young man about 20, admitted April 3, of delicate constitution, but regular habits, had been engaged four years in copper works, at Micham, and frequently exposed to great changes of temperature. He received a blow from a mass of copper, which broke his thigh. It was found that the femur was fractured just above the condyles, and the integuments of the back part of the thigh were deeply lacerated in a transverse direction, but not much bruised. The bone had protruded, was partly deprived of its periosteum, and could with ease be felt at the bottom of the wound. The upper portion projected outwards, and the lower was a little depressed. The man was placed on the double-inclined plane, in a bent position, with thigh splints. He was ordered for four days calomel and opium, and a bread and water poultice was applied to the wound. There was very little excitement, for which he was ordered to take Liq. ammon. acet. On the 15th the wound had suppurated very favourably. He continued doing well until May 15, when, on examining the limb, union was found to have taken place, the wound being reduced to a simple sinus, which probably will not heal

until exfoliation of a small denuded portion of bone has taken place.

It is scarcely necessary, gentlemen, to notice, in reference to the subject before us, how little attention is paid to the dogmatic doctrines of the older surgeons, and how much observation of the present day has tended to modify their rules of practice. We find in the writings of Mr. Pott, Desault, and others, rules laid down for the position of fractured limbs, as if bones were liable to be uniformly broken in one particular direction, and as if muscles must invariably tend to produce one kind of deformity. One surgeon we find directing all his fractured legs to be placed on the outer side, with a view of relaxing the whole set of muscles attached to the limb; another we see uniformly adopting the straight position, in cases of fractured thigh. Such exclusive practice could arise, one would think, only from very limited experience, did we not know that such recommendations have proceeded from men of extensive practice and generally correct observation; but as far as my experience has gone, I must say that a surgeon who sets out in practice on the principle of adopting one position for fractured limbs, will find that muscles will distort, and that limbs will become crooked, in spite of established rules.

Why not, as in other affections, be guided in our treatment by the circumstances of the case, instead of adhering to rules which can only have a limited application? The displacement of a bone, when fractured, we attribute to the contraction of muscles under excitement or irritation; but the main circumstance that determines the direction in which the bone is distorted, is the direction which the fracture takes. If, for example, the tibia be fractured about its middle, the fracture extending obliquely upwards from before to behind, it is generally found that the upper portion protrudes, from the action of the extensor muscles of the leg on the tubercle of the tibia; if the fracture be nearly transverse, the contraction of the gastrocnemii and the deep muscles of the leg forces the bone to assume an angular position; or if the fracture happen to take an inclination downward, from before to behind, the

long flexors of the leg frequently draw the upper fragment backward, while the muscles of the foot draw the lower portion upward and forward. Under this variable disposition to displacement, blind adherence to one position affords but a slender protection against deformity. It is the direction of the fracture and the nature of the displacement to which attention should first be paid. Endeavour, when you first examine a fractured thigh, to ascertain the position of the broken ends of the bone, in order that you may judge what position will be best adapted to the nature of the fracture, and that you may know what force you will afterwards have to counteract, in order to keep the extremities of the bone in apposition.

The most usual modes of displacement to which fractures of the shaft of the femur render the bone liable, I have had represented in the diagrams which you now see.

The first diagram represents the kind of fracture that occurred in Hallin, in which the tendency to displacement, although the fracture occurred high in the bone, is by no means so great as when the obliquity is in the opposite direction. Here the effect of the flexors in drawing the upper portion of bone forward is much less; and the lower portion, not having pierced the cruræus muscle, is not thrown forward by the upper. In such a case, the points to be attended to, and by no means difficult of attainment, are to place the limb in a bent position, to relax the psoas and iliacus, and to make use of counter-extension, to prevent the lower portion being drawn up. Such a case will generally be found, with moderate care, to terminate with a very straight limb, and no shortening.

A fracture at the same part of the limb, but in a different direction, presents a case somewhat more difficult to manage, and requiring more skill on the part of the surgeon. When the upper fragment overlaps the lower, it is apt to project, both from the contraction of the iliacus and from the lower portion being drawn up so as to thrust the upper forward. There are very few museums that have not one or more specimens of badly united femur when the fracture has taken place in this direction. To prevent deformity,

it requires a well-adjusted apparatus and efficient counter-extension of the lower portion, in order to counteract the tendency to displacement. There is a fracture frequently occurring at the upper third of the bone, by which the broken extremity of the upper piece is forced into the vastus externus, and occasionally with great difficulty disengaged, and prevented from coming through the integuments. From the direction of the displacement the fault might seem to rest with the action of the smaller glutæi on the trochanter major, but I have not found that by abducting the limb the position of the bone was improved; the course of the outward projection depends entirely on the muscles shortening the limb by drawing up the lower portion, and forcing the upper piece outward; for by attending to the due extension of the limb, such deformity may be generally prevented. In the case of the compound fracture related above, in which, from the situation of the wound, adequate support could not be given to the bone, the upper portion is found slightly to overlap and project outward. A simple fracture of this kind is a good test of the utility of an instrument, and also of the ability of the surgeon, for without careful adjustment, by means of an efficient instrument, the case rarely turns out to the credit of the surgeon. This kind of fracture is illustrated in the third case related above.

The above remarks apply equally to fractures of the lower part of the thigh; but it may be observed that fractures at this part of the limb are kept in position with more facility, although some difficulty may at first arise in adjusting the ends of the bone: both these circumstances depend on the greater breadth of surface which the bone here presents. In the case of Grant, one circumstance worthy of notice is, the tension of the whole limb below the seat of injury indicative of the effusion which has taken place into the joint and surrounding textures, so as to prevent a free return of the venous circulation; in a compound fracture such an occurrence argues ill for the powers of restoration: but when the fracture is simple, the obstructing cause becomes by degrees removed, and the œdematous state of limb soon ceases. The upper portion of the shaft was directed to-

wards the ham, but by a full pad being laid under it, so as to give it support, and bending the knee so as to relax the long flexors and gastrocnemius externus, the bone has maintained a good position, and union is going on favourably.

Whatever instrument you employ, your endeavours should be directed towards maintaining a firm position both of the pelvic and lower portion of the bone. The former is with difficulty kept quiescent, unless great attention be paid to the axis of the pelvis. In fractures of the arm, a slight degree of shortening is overlooked, and produces no inconvenience to the patient; but a shortened thigh remains a monument of the unskilfulness of a surgeon: in the former, the ends of the bone when once adjusted by a bandage and splints easily maintain their position, but not so in a fractured thigh: the continued movements of the pelvis (unless confined) displace insensibly the upper fragment, and force it to ride over the lower. Having adjusted the splint (and I can strongly recommend M'Intyre's, which you have seen employed in the above cases,) so that it shall reach from the sole of the foot to the tuberosity of the ischium, against which point of bone your counter-extension is to be made, take care that the line of limb is exact—that the transverse axis of the pelvis is preserved at right angles with the thigh—and that the patient's body lies in an exact line with the limb. The foot and leg should then be bound firmly to the splint, an assistant keeping up extension, to prevent the muscles from drawing up the lower portion of bone: in the same manner small splints and pads should be bound round the thigh with either a roller which includes also the splint, or with straps and buckles; the latter being regulated with more facility, are preferable. With such an apparatus, however, well applied, the provision for guarding against the movements of the pelvis is certainly imperfect; no pelvis strap or bandage can entirely control its motion; and though it may be fixed to the thigh splint by a bandage passed across the lower part of the abdomen, the upper part of the trunk being left at liberty cannot fail to influence by its movements the position of the pelvis, and to produce overlapping of the bone.

Mr. Key concluded by describing the advantages which he proposed from the addition of an 'arm-piece, as employed in the cases now in the accident-ward of the hospital. Its purport is to make a certain degree of counter-extension against the axilla from the knee portion of the thigh splint, thus acting directly upon the lower fragment of the femur; it also regulates the motions of the trunk, by preventing it being inclined forwards, a position to which patients with fractured thighs are too prone; and limits the lateral inclination of both the upper part of the trunk and pelvis. A strap may be carried round the pelvis and thigh, so as to effectually fix the pelvis to the arm-piece, and prevent the thigh being carried inward from the thigh-piece, which displacement arises from oblique motions of the pelvis upon the head of the femur. The cases upon which the arm-piece had been tried had turned out exceedingly good limbs, and were the best test of its practical utility.

OBSTINATE CONSTIPATION.

To the Editor of the London Medical Gazette.

SIR,

THE following case is one not of every day's occurrence; yet as there is great reason to believe it does actually occur more frequently than professional men are commonly aware of, I think it deserves a place in the Medical Gazette.

A. B. a female, about 60, a few weeks ago became a patient of mine. Her general health was good, and she took her meals with appetite. She was a woman of very sedentary habits, seldom or never moving from the house, or using any kind of exercise. She stated that for a long time she had been subject to habitual costiveness; and that she was constantly obliged to have recourse to opening medicine, of some kind, without which the bowels would become permanently confined. Her first application to me was when she stood much in need of

such medicine. I found much difficulty in procuring evacuations, which were effected only by strong cathartics in repeated doses. I therefore directed her nurse to try the effect of a daily use of warm water as an enema; and to throw up a bulky injection immediately after the stomach was distended by her breakfast. I also advised my patient, about a quarter of an hour after that meal, to make an effort to relieve herself; and by such means endeavour to bring the bowels into a habit of emptying themselves. Nothing but gruel was allowed her for supper. After the first attempt to throw up an enema of warm water, the nurse informed me that my patient had "*piles*;" and also that "*her body was much down*." Of course, from this description, I concluded that there was prolapsus ani. On examining my patient, in order to ascertain her real condition, I found a few hæmorrhoids externally; but I quickly perceived that what the nurse had in the first instance mistaken for a protrusion of the gut, was in fact an actual protrusion of scybala; so hard, firm, and compact, that although, by the repeated efforts and straining of the patient, the anus was so stretched as to be very open and large, yet she could not relieve herself. I therefore had immediate recourse to mechanical means; first making use of the handle of a table-spoon, as a sort of scoop, and afterwards of my finger; and, to my surprise, I found the rectum stretched and expanded into a capacious bag or pouch, and filled with scybala; an amazing quantity of which I removed, some part of them being so dry as to crumble into powder when crushed. Having perfectly cleared the gut, as far as the finger could possibly reach, it became a question whether or no there were other accumulations of a similar kind higher up. That there were, I could scarcely doubt, and I considered it indispensibly necessary that there should be a perfect clearing out of the retained materials. For this purpose various means were adopted. The patient was put into a warm bath, to promote relaxation; purgatives of various kinds were given, in order that, by their respective specific action, every part of the alimentary canal might be stimulated. Calomel, jalap, cathartic extract, the black draught, ol. ricini, &c. were administered in succession for some

days. The whole surface of the abdomen was subjected to friction with an oiled hand, in a circular direction, from right to left above, from left to right below, from above downwards on the right side, and from below upwards on the left. Clysters of warm water, in the quantity of a pint and a half, were thrown up; and the patient was confined strictly to a water-gruel diet, into which a portion of ol. olivar. was daily put without her knowledge. This plan was followed day after day for some time, and with the best effects; for during many days a considerable quantity of fæcal matter was brought away, of the most offensive nature; and the abdomen, which before was full, firm, tense, and unyielding, now became reduced, relaxed, and soft. The motions gradually assumed a natural appearance; the aperient medicines by degrees were laid aside; and at last, when there appeared to be no further occasion for their use, left off altogether. A free passage throughout the whole alimentary canal appeared to be re-established, and a healthy action of the different organs brought about. In this state the patient removed to another part of the country, and I have not heard from her since. She had never been subject to hernia; neither was there any disease of the pelvic viscera; nor any thickening or enlargement of the uterus or the bladder, so as to press against the rectum. After she became my patient, I learned that the medical gentleman who previously attended her, had for a long time given her drastic cathartics, sometimes, I believe, elaterium; but all the evacuations that were procured must have passed down, in a more or less liquid state, between the sides of the rectum and the hard accumulated fæces it contained. On no occasion, while under my care, was she troubled with sickness or vomiting; nevertheless, I satisfied myself, by examination, that there was no hernia; and, by examination per vaginam, that there was no diseased enlargement of the uterus, &c.

The history of this case I think satisfactorily proves that in many instances of long continued and obstinate constipation, a personal examination of the patient is absolutely necessary. Had not this female been mechanically relieved, her life must ultimately have been sacrificed, and doubtless many a

life has been lost for want of such examination.

I am, Sir,
Yours, &c.
WILLIAM COX.

London, 20th May, 1829.

P.S.—There was a remarkable dirty yellowness of skin, or rather, dirty *sal-lowness* in this patient; which I attributed to the long retention of fæcal matter in the alimentary canal, for the skin became improved in clearness after she was relieved.

LACERATION OF THE TRICUSPID VALVE.

To the Editor of the London Medical Gazette.

SIR,

If you think the following case worthy a column in your valuable journal, you will oblige me by inserting it.

Your constant reader,
ALLEN WILLIAMS.

St. Thomas's-Street, Southwark,
May 29, 1829.

J. S. aged 41, had been subject occasionally through life to all the symptoms of hypertrophy of the heart, which was attributed to a rheumatic attack in his childhood.

On Wednesday, 15th inst. in assisting to raise a heavy cask, by a sudden exertion of his arms, he felt the sensation of a snap in the region of the heart; this was followed by syncope and vomiting, with great palpitation and irregularity in the heart's action. These symptoms recurred at intervals until the Monday following, when he died, comprising a period of 110 hours.

The treatment was as follows:—On his pulse rallying after the accident, a small quantity of blood was taken from the arm without advantage. Submuriate of mercury, with opium, cordials, æther, and ammonia, were exhibited to relieve his distressing nausea, vomiting, flatus, and faintings.

The opium appeared to be the only efficient remedy in controlling the heart's action: it corrected its great irregularity, and restored it to 84 regular beats in the minute, even within eight hours of his dissolution. Towards

the close of life, however, the preceding symptoms of palpitation and syncope were greatly aggravated.

Post mortem examination, in the presence of Dr. Cholmeley, who had attended the patient with me.—On opening the pericardium, two ounces of bloody serum were found. The heart was enlarged to more than double its usual size, especially on the left side, the parietes of which were very greatly thickened; as also were the *carneæ columnæ* and *chordæ tendineæ*, and hardened, almost of a cartilaginous character. Nothing peculiar in the mitral valve, nor in the pulmonary veins. In the right ventricle, the cause of death seemed explained by an horizontal laceration, to the extent of a quarter of an inch, in the tendinous expansion of one portion of the tricuspid valve, which did not exhibit any previous disease, save slight thickening at the root. The semi-lunar valves of the aorta were thickened and ossified, and there were two or three deposits of ossific matter at the origin of that vessel.

DEAD BODIES.

To the Editor of the London Medical Gazette.

MR. EDITOR,

I HAVE headed my communication with the above taking title, on the principle adopted some years ago by a writer in a provincial newspaper, who seduced many into reading a long letter on Rugby School (on which subject the newspapers had teemed for weeks, *usque ad nauseam*), by printing at the top, in large letters, "THE QUEEN," who, though, properly speaking, no *subject*, was at that time an universally attractive one.

My sign of invitation, however, is rather more appropriate, for it is to a DEAD BODY that I wish your attention to be directed, or at least to a body which, whether from asphyxia or inanition, has shewn no signs of vitality for a very considerable period. I allude, Sir, to a body of men, or more properly speaking, of *men-midwives*, who were at one time congregated under the name of the "Obstetrical Society." I would ask what has become of that society; what has it been doing; and why is it so silent?

It is now about a twelvemonth since the last general meeting of members; when certain duties were undertaken by a committee, pursuant to certain resolutions, and it was supposed that great things would be effected during the following autumn. As winter approached, the struggle was to commence: the three medical ruling powers were to be brought on their marrowbones, and man-midwifery was to be in the ascendant. There were wars and rumours of wars; an act of parliament, or a secretary of state's warrant, was to turn the College of Physicians into a Lying-in Hospital, and Sir Anthony Carlisle was to be compelled to go out as a monthly nurse. The arrival of the President of the Society from his annual rustication, was to be the signal of battle, and each humble obstetrician held himself in hourly expectation of being mustered for actual service, or at least for a field-day review.

But months have rolled on, the Catholic bill has been carried, and the anatomy bill has miscarried; M.P.'s are waiting for the dissolution of parliament, and M.D.'s for the dissolution of patients; all parties looking forward to a happy release from their labours, whether in repairing or breaking in on constitutions; and yet nothing has been done for our unfortunate obstetrical society!

"I must own the soft impeachment:" Mr. Editor, I am a man-midwife!—Yes! I am one of that degraded caste—a very pariah of the profession. Condemned to such disgusting drudgery, how can we expect to be acknowledged by the doubly-refined Fellows of the Royal College of Physicians, or by the unsullied purity of our hospital surgeons? "We turn up our noses at you!" cries Sir Henry, as, suiting the action to the word, he is busily engaged in examining, with dilated nostrils, the close-stool of some illustrious dowager. "You are a nasty set of fellows!" says Sir Astley, whilst, as dexterously as appropriately, he is poking his finger, knuckle deep, into a patient's well-stocked rectum. Such occupations are, indeed, dignified and ennobling, suitable to those liberal and enlightened individuals who have been elevated to pre-
side over our medical corporations.

But I must conclude, Mr. Editor: having, however, paid my two guineas to the obstetrical society, I feel myself

justified in calling for some information how the money has been appropriated, and what good all our contributions are likely to effect. If any of your readers will enlighten me on these points, they will much oblige,

Sir,

Your obedient servant,
A MAN-MIDWIFE.

June 14, 1829.

MEDICAL CONTROVERSIES.

To the Editor of the London Medical Gazette.

SIR,

I HAVE lately been much amused at the disputes which have been going on in your Gazette about priority of discovery. What a pugnacious animal is man! even in the pursuit of knowledge he can scarcely take a step without stirring up hostility. Here are Mr. Bell and Mr. Mayo at issue about who discovered the separate functions of the nerves; Dr. Baron* and Dr. Hodgkin about who discovered the origin of tubercles in cysts; and, bringing up the rear, and I suppose as a quiz on the folly of these disputes, Dr. Hastings claiming for the Worcester Medical Society the priority of petition in favour of the anatomy bill! If they were aware how little the profession knew or cared about these questions, they would not waste so much ink and occupy so much of the Gazette only to be laughed at by their readers. In the case of *Shaw v. Mayo*, such is the state of their minds that, without doubting their "veracity," it is impossible to trust the assertions of either side; the only way to judge is, to investigate the facts one's self, and the question is not worth the trouble. As to the Worcester Medical Society *versus* all other petitioners, the letter could never have been written gravely; it must have been ironical; a *reductio ad absurdum* of the other controversies. With regard to Baron *versus* Hodgkin, the first question is, whether the opinion, a priority in which is contended for, is true: now this admits of a great doubt in the case of Dr. Baron's notions of tubercles.

* We stated in our last number, on the authority of Mr. Bell, that he had nothing to do with the discussion in question. We also think it due to Dr. Baron to state that he is not *M.D. Oxon.*—*ED. GAZ.*

Several years before Dr. Baron published his first book, Dr. Jenner was in London, and showed to some anatomists what he supposed to be hydatids in the liver of a sheep: they were only the cavities of little abscesses: it was plain that he had mistaken the first step of the inquiry; yet this is the source of Dr. Baron's notions. Dr. Baron and his provincial admirers complain that these notions are so little understood, and so little attended to: for the former he has to thank the obscurity of his statements; the latter depends on a cause which it is right he should know, that it is the opinion of the best morbid anatomists in London that he is making a great fuss about nothing at all—that he has got into a subject, but has mistaken the right road out of it—that he has been fighting for priority in the discovery of a pathological blunder. The whole subject will be disclosed before long by more hands than one, and any further explanation would now be premature; but time will show that Dr. Baron is wrong on two points—the difference between hydatids and cysts, and the real process by which tubercles are formed. To a man of active mind and scientific pursuits it is a great intellectual misfortune to live in the country: he is sure to be spoiled—to acquire a disproportionate estimate of his own powers and opinions. Instead of meeting with minds on a level with or above his own, who would soon cure him of his errors, he meets with none but those who, if not feeble in mind, at any rate know nothing about the subject; who listen without questioning—believe without doubting—and applaud without moderation. Who can stand this? even Darwin, one of the most vigorous, profound, and fertile minds that ever entered our profession, was spoiled by this process. It is true, he associated with some first-rate individuals, but they were out of his profession; within it, he had nobody to associate with but pigmies compared with himself. If he had lived in London, he would never have published some of his opinions and practical proposals.

I am, Sir,

Your obedient humble servant,
A MORBID ANATOMIST.

June 15, 1829.

ANALYSES OF BRITISH MEDICAL JOURNALS.

LONDON MEDICAL AND PHYSICAL JOURNAL.

June 1829.

Observations on the Schools, Hospitals, and Practice of Italy. By G. A. GORDON, M.D. formerly House Surgeon to the Royal Infirmary, and President of the Royal Medical Society of Edinburgh.

THE following neat sketch of the state of medicine and medical institutions in Italy will, we think, be read with interest. The only alteration we have made is that of condensing it a little: the language of the author is retained throughout.

The medical schools of Italy are numerous and extensive, and are all remarkable for a very strict academical arrangement. The clinical department is conducted in a most simple and judicious manner. The patients who form the subject of the clinical lectures are seldom more numerous than twenty, and are kept in a ward separate from the others. In several of the schools, as at Florence, each patient is intrusted to the care of a pupil, who observes minutely the nature of the disease, and the various changes which it undergoes, and makes an accurate report of them, which is read before all the other students, and commented on by the professor, at the bedside of the patient. The professor also gives a lecture daily, which includes a detailed account of each particular case.

The great universities of Italy are those of Pavia, Padua, Pisa, Bologna, and Rome; and of these, Pavia has long been the most celebrated, and still enjoys the highest reputation. The system of education pursued in it is most complete. To obtain a degree in medicine, the candidate is obliged to have studied for a period of four years, during which he must have attended lectures on almost every branch of knowledge connected with the science of medicine, and particularly on anatomy and physiology, materia medica, and clinical and practical medicine, to which he devotes several courses. He must attend also lectures on surgery, clinical as well as theoretical; and is recom-

mended to make himself acquainted with natural philosophy, natural history, geometry, &c.

The curriculum of the pupils in surgery is on the same extended scale. They devote their time principally to anatomy, physiology, theoretical surgery, clinical surgery, operations on the dead body, midwifery, &c. They also attend lectures on the more immediate subjects of medicine.

Before a student can be allowed to enter to any of these lectures, he must previously have undergone an examination in the more elementary branches of knowledge, such as Latin and Greek; and, at the commencement of each year, he is examined on the subjects embraced by the lectures of the last.

The examination for the degree of doctor is a public one. The candidate draws out of a bag containing the names of the principal diseases of the body, those of four, which he delivers to the examiners, who immediately catechise him on every point connected with them. He is also shut up in a room, and writes a thesis on one of these diseases, solely from his own knowledge, and without the assistance of any books. The examiners then retire, and afterwards announce their determination to the public, as well as to the aspirant.

After a student has obtained a degree, and before he can legally attend a patient, he must have followed the practice of a large hospital in the same capacity as our house-surgeon and physician, for a period of two years; and afterwards have undergone an examination in practical medicine and surgery. Nothing can be more extensive and severe, and at the same time more fair and judicious, than this system of medical education, which is greatly superior to that adopted by any of the British universities.

The great ornament of this school, and indeed of Italy, is the veteran Scarpa, whose splendid talents have enriched, in an astonishing manner, the numerous subjects to which they have been applied. This great man, though now very far advanced into the vale of years, and nearly blind, continues to prosecute his researches; and the extensive correspondence which he maintains with men of talent in every quarter of the world, is a sure proof that he still lives to science. The sub-

ect of aneurism, with which his name is indelibly connected, is the one in which his mind is constantly engaged, and it is said he will soon give to the world some further observations on this interesting disease.

The university of Pisa*, situated in the Tuscan territory, is the one which ranks next to that of Pavia, though formerly Padua enjoyed as high a reputation as any. Pisa has been brought into notice principally by the talents of Vacca, whose premature death the medical profession has had so lately to deplore. The system of education at this school differs little from that adopted at Pavia. The most distinguished individual at present connected with it is Savi, the professor of botany.

The school of Bologna, indebted entirely for its present elevation to the exertions of Tommasini, attracts, for the study of medicine, a great number of pupils, but as a surgical school it is not in much estimation. The clinical instruction here is very extensive. An hospital capable of containing a hundred patients, is appropriated to this purpose: half of these are, however, surgical cases.

Tommasini explains, at the bedside of each medical patient, every circumstance of his case, and afterwards gives a more general lecture at the university. The great number of clinical patients is rather, however, to be considered a disadvantage than an advantage to the pupils. The lectures of Tommasini, though highly theoretical, are yet replete with information, and are delivered in a very impressive and attractive manner. This great physician was obliged to fly from Parma, his native city, on account of his political writings, but his powerful talents soon procured him an extensive practice in his adopted city.

The university of Rome, called La Sapienza, as a general one, is now probably the most complete and extensive on the continent, excepting that of Paris, but as a medical school it is inferior to those already mentioned. The building itself is a most magnificent structure; one, indeed, of the finest

of modern Rome: it was designed by the famous Michael Angelo. At this institution no less than forty-seven different lectures are given, the number of professors being forty-three. These lectures embrace, on a very extended scale, every branch of human knowledge. One of the most distinguished professors of this school is Morichini, professor of chemistry, the friend and associate of the illustrious Davy.

The hospitals of Italy are also numerous and extensive, but differ much in their police and arrangement. Some of them are admirably conducted, while others again are remarkable for filth, bad ventilation, unhealthy site, and crowded state. In all the hospitals there are a number of young men, from twenty to thirty, who perform almost the same functions as the dressers in the London hospitals, but live in the institution, and are lodged and fed at the expense of government. They also receive about three shillings a month of salary. Each patient, on his admission into an hospital, is provided with a robe, either red or black. The rest of his dress he must procure for himself. The beds in the Italian hospitals are in general formed of wood. The floors of the wards are all of brickwork, which is not washed oftener than once a year, but polished by means of constantly rubbing and brushing.

The principal hospital of Milan is a very large establishment, and well conducted; but none of its medical officers are men of great celebrity, and I observed nothing in their practice peculiar to them alone.

In Bologna, besides the clinical one already mentioned, there are three hospitals, extensive and well managed: from these the clinical hospital is supplied with the choicest cases, medical as well as surgical.

The hospital at Florence, which contains about four hundred patients, is one of the cleanest and best conducted in Italy, and attached to it is a small medical school. The system of clinical instruction here is well worthy of attention. The students are obliged to attend regularly every morning, their names being called over by the professor, who gives a lecture daily, and afterwards holds an examination. The professor of clinical medicine at this hospital, M. Nespoli, is one of the most intelligent physicians in Italy, and

* I am perhaps mistaken in placing the Tuscan university before that of Bologna. It is difficult to determine that point, in consequence of individuals always supporting the reputation of that school with which they have been connected.

his attention and kindness to Englishmen I feel a grateful satisfaction in recording.

In Rome there are several hospitals appropriated to different purposes: some of them, as the Consolazione, are excellently managed; while others, as the St. Jacomo, are exactly the reverse. The latter, capable of containing about six hundred patients, is intended for chronic surgical cases only. It is composed of two principal wards, a male and female; and two clinical rooms, which hold about seven patients each. The male ward is one of the most extensive I have ever seen, and contains, when full, nearly two hundred beds. These are arranged in four rows in the ward, which is not so broad as that of St. Bartholomew's hospital. The patients are kept in a very filthy state. The floors of the hospital are on a level with the ground, and the building is situated in a low and unhealthy part of Rome. From these circumstances it may be readily anticipated that the hospital cannot be a very healthy one; and accordingly I found that, at particular seasons, and especially in the dogdays, erysipelas and hospital gangrene raged to a very great extent. The latter attacks, at those seasons, every wound or ulcer, and frequently produces fatal consequences. The chief surgeon of this hospital is Sisgo, who at one time enjoyed the first reputation in Rome, but is now too old to be an operating surgeon. He has done little for the advancement of surgical science. He has published only his *Clinique*, from which I was unable to gather any thing of importance. In it, however, he has given an account of a most enormous sarcomatous tumor growing from the neck, hanging over the shoulder, and reaching nearly to the level of the navel, which he extirpated with success. His most successful operations have been those for the stone, which he extracts by means of the lateral operation of lithotomy performed with a knife, much resembling that of Cheselden. The external incision he makes remarkably small. He is a great advocate against the tying of arteries in cases of aneurism, which he treats, and he alleges successfully, by means of compression. He has invented an instrument on the principle of the tourniquet, which he applies to the artery at some distance

above the disease, so as to retard, though not completely to arrest, the circulation of blood through the aneurism. He afterwards applies compresses graduated over the tumor. The professor informed me that he had met with few cases which did not yield to this treatment; a statement which must be received with much qualification. In some instances where he had tied the artery, (previously to adopting this plan,) and particularly where he had followed the practice recommended by his celebrated countryman, Scarpa, of interposing a small compress between the artery and the ligature, he had encountered secondary hæmorrhage. On the whole, he prefers amputating to the Hunterian operation. He prefers also tying the artery at the outside of the sartorius muscle, as being less likely to endanger secondary hæmorrhage.

The Consolazione is also devoted entirely to surgical cases, such as accidents and sudden diseases requiring immediate operation. It is composed of two long wards, capable of containing one hundred patients each, one for males, the other for females. It is a remarkably clean and well-ventilated hospital, and affords quite a contrast to the other. It is under the charge of M. Trasmonti, a very rough though excellent surgeon.

The medical hospitals of Rome are two; one, that of Santo Spirito, for males, and that of St. Giovanni, for females. The hospital of Santo Spirito contains about seven hundred patients, and is under the direction of several men of talents and experience. The *Clinique* of this hospital, conducted by Professor Matheis, is one of the best to be met with any where. Professor Folki, a most intelligent physician, is also attached to this hospital.

The hospitals of Italy, like those of France, are entirely supported* by the government of the country, which has the entire management of them. No pupil ever pays any fee for being admitted to attend the practice.

The medical practice of Italy is certainly greatly deficient in most of the grand points which are generally supposed to form the glory of English practice. An ignorance of, and inattention to, pathology is universal in

* Voluntary contributions are, of course, frequently made to these institutions.

Italy. Diseases are treated more according to the rules of systematic writers, than from a firm conviction of the dangers arising from a change in the structure of the organs of the body: symptoms are combated more than the actual disease; and hence it follows that the diagnosis of Italian physicians is frequently incorrect; their practice always feeble, often inert; and their remedies applied late, and with a sparing hand. From this general view of their practice, it may be readily conceived that their success is, in comparison with English practice of medicine, very limited; and I have little hesitation in stating that I have seen many patients die in the hospitals of Italy, who would undoubtedly have been saved by a more vigorous practice, such as that followed in England. Bloodletting, the grand sheet-anchor in acute disease, is used in a style throughout Italy, and more particularly at Rome, which must astonish every enlightened mind. Blood is drawn away in a small stream, in quantities from six to twelve ounces; the greatest care being taken to prevent *deliquium animi*, which is reckoned a very bad circumstance. These small bleedings are very frequently repeated, sometimes three or four times in the course of twenty-four hours, but, as may be well imagined, with little effect. In the course of an acute inflammation, the Romans perhaps abstract more blood than the English physician would do, but by no means with the same benefit; for it is an axiom in the practice of medicine of England, that a copious and well-managed venesection at the commencement of acute inflammation will be of more use than numerous small ones during the progress of the disease.

The next most powerful remedy in subduing acute inflammation which we possess is the tartrate of antimony, and one which is in general estimation in England. The application of this remedy, in the treatment of inflammation, is little employed in Italy: at least, during my visit I never happened to see it used*. The kermes mineral,

it is true, is in very frequent employment; but this more as a diaphoretic than employed in nauseating doses to depress the powers of the circulating medium. Decoctions of sarsaparilla and sassafras, and a variety of inert drinks, with numerous emollient clysters, are the means in general use. Purgatives to any great extent are not given; two or three grains of calomel being the strongest generally employed.

There is part, however, of the medical practice of Italy in inflammatory affections well worthy of attention, and that is, the very strict attention to diet and regimen; a thing of the greatest importance in the treatment of all diseases, and one to which little attention is paid, comparatively speaking, in England.

Percussion and the stethoscope, the use of which has undoubtedly paved the way for those great discoveries of the pathology of the pectoral viscera, for which the world is indebted to the indefatigable talents of Laennec, are never employed in the hospitals of Italy; and, consequently, the Italian physicians are unable to form that accurate diagnosis of the various shades of disease to which these organs are so liable, and from which alone can be deduced a proper and certain method of cure.

It is very generally supposed in England, that, owing to the mild and salubrious climate, phthisis pulmonalis is a very rare disease in Italy. This, however is a very ill-founded opinion; for in every part of that country it is a very common complaint, and differs in no degree from that which is so great a scourge to the British isles †.

“Fevers of every kind are numerous in Italy, and differ in their type according to the season of the year, but in general are complicated with affections of the chylopoietic and assistant chylopoietic viscera. Their treatment differs in little from that followed in England, and is in general very successful.

Italy is the country to study intermittent fever, which, during the summer and autumn, rages to a very great extent, and numerous cases of which, under a secondary form, are always to

* Mr. North has referred me to the Medico-Chirurgical Review for March 1822, p. 752, in which it is said that Dr. Carlo Bellatti, a distinguished physician at Pavia, was in the habit of giving enormous doses of the tartar emetic—half a drachm to three drachms daily. This is certainly, however, not the general practice in Italy at the present moment.

† In the Papal territory it is considered to be an infectious disease, and the police are extremely strict in burning the clothes of the dead, and in fumigating their apartments.

be found in the hospitals, even during the most wintry season of the year. The Pontine marshes, situated between Rome and Naples, are the most fruitful source of this form of fever, and during the season the hospitals of Rome, as well as those of Naples, are filled with cases produced by exposure to the malaria of these marshes. The spleen is, in general, the organ most affected. The liver also is very frequently attacked.

Some very excellent observations have been published on the composition of the atmosphere of the Pontine marshes, and particularly by M. Brochi, in conjunction with Professor Morichini; from which it appears that these excellent chemists were unable to detect any change in the composition of the air, except the addition of some aqueous exhalation in the worst places, and at the worst seasons of the year and periods of the day. From these observations, and those of Professor Folki, of Rome, it is also shewn that an uniformly dry and warm state of the atmosphere is the freest from fever, and that the most numerous cases occur when rains are succeeded by intense heat.

The worst periods of the day are immediately before sunrise, and immediately after sunset. Sleeping in the 'mal'aria' is almost certain to induce intermittent fever. Woollen clothing, as flannel, is stated to be a great preservative against taking the fever—a fact well known to the ancient Romans.

Professor Folki denies, in toto, the existence of any peculiar obnoxious principle in the atmosphere of marshy grounds, and observes, that he considers the disease to be sufficiently accounted for, by the aqueous vapour condensing and producing cold, by the fall of the temperature of the atmosphere at sunset, and by the cold wind, which frequently prevails, acting on a system out of order from irregularity of living, or other causes. The Professor, who has been long engaged in researches into every point connected with this fever, considers the proximate cause of it to be a want of equilibrium between the electricity of the atmosphere and that of the body—a theory which he has sustained in a very plausible manner, though the reasoning rests rather on negative than positive evidence.

In an admirable clinical lecture by

Professor Matheis on this subject, at which I was present, he observed that he had never seen a well-marked instance of the disease produced for the first time during the cold months of the year, and he was inclined to deny its possibility altogether. But during my stay at Rome I had an opportunity of seeing a well-marked instance. Dr. Fleming, of Manchester, was exposed, on the 12th of December last, the weather at the time being cold, to the influence of the malaria of the Pontine marshes. He was kept in the open air for an hour at midnight, at Teppacina, a small town at the frontier of the Roman territory, while his baggage was examined by the revenue officers. He experienced at the time a sensation of cold, and next day had a most severe and well-marked attack of fever, which assumed the quotidian type, and was an extremely severe case. He suffered from it, more or less, for three months. I narrated this case to Professor Folchi, and he observed that he conceived it not impossible that a foreigner, unused to the air and climate of Italy, might be attacked even during winter; but he had, during his long acquaintance with the disease, never seen a single primary case during winter in a native of the Papal dominions.

Bark and sulphate of quinine are the only remedies ever employed in Italy in the treatment of intermittent fever, and they are considered as specifics. The former, to the extent of half an ounce per day, is given in hospital practice, as being more economical; the latter, to the extent of six or eight grains a-day, to private patients, as being a more agreeable, and perhaps more efficacious, form. Arsenic and opium, I was informed, are never employed during any stage or shape of intermittent fever. Secondary attacks of intermittent fever are not uncommon during the cold weather, and I saw numerous instances in the hospitals.

Surgical Practice. — The general surgery of Italy, during later times, has made but little improvement, notwithstanding the writings of Scarpa and Vacca, and the facility with which the best authors of England and France are procured.

The surgeons of Italy are still sadly ignorant of the facility of curing wounds, whether arising from accident or surgical operations, by what is called the

first intention; and this may be considered the grand defect of Italian surgery, and one which pervades the whole practice. Thus, whether a mamma be extirpated or a tumor excised, the wound is stuffed with lint, and the patients, if they escape the violent inflammation which too often follows, are subjected to an extensive suppuration and long process of cure. All ulcers in Italy are dressed in the same way; that is, covered with charpie. The method of Baynton, the application of stimulants, and the use of constitutional means, as far as I could observe, are little, if at all, employed. The lunar caustic is sometimes employed to check granulations; but this is the only substance I have seen used in any of the hospitals of Italy. In amputations, however, it must be allowed, they adopt the English system of union by the first intention. At Rome, and in general throughout Italy, the circular amputation, "*en deux tems*," is the one employed. The following is the method:—A tourniquet (and those instruments in Italy are of a very miserable description) is applied to compress the artery, at a very short distance indeed above the disease for which the amputation is performed. A ribbon is then placed round the limb, to mark the point where the incision is to commence, and, by compressing the nerves, to prevent the pain as much as possible. The Italian surgeon then, with a *large scalpel*, performs the circular incision in the usual way: the ribbon is then withdrawn, and the muscles divided. The surgeon then ties the artery; and this is managed* in a style quite abhorrent to the genius of English surgery: a broad ligature is employed, and artery, veins, and a large portion of the muscles, are included. The edges of the wound are then brought in contact by means of adhesive plaister.

There is one small circumstance connected with the dressing of wounds, which struck me as particularly neat, and which is, perhaps, of considerable importance; viz. the method of using adhesive straps. The strap is cut very broad at the extremities, and narrow in the centre, so that it is enabled to take a firm hold of the edges of the wound, and exert a considerable power of re-

taining them in contact, while large spaces are left between each slip in the middle, which permits the free discharge of the pus and ligatures.

The Italian treatment of injuries of the head is in many cases too active, while in others patients are often lost from deficiency of vigour. Thus, in many of the hospitals in Italy, the system of trepanning, nearly as recommended by Pott, is pursued; but in patients attacked with that very common and insidious inflammation of the membranes of the brain, which is the result of external injury, and where the most vigorous depletory treatment is required, their measures are in general limited to one or two small bleedings, to the exhibition of a few purgatives, and the employment of drinks and decoctions of no avail.

Fractures of the extremities, in most of the hospitals of Italy, but particularly in those of Rome, are treated in the straight position. M. Trasmondi, one of the principal surgeons of that capital, informed me that his success was very great, and that he had come to the determination, from the results of an extensive practice, of employing that position in every instance. But nothing, surely, can be more erroneous or empirical than to lay down a general rule for the treatment of all cases, of whatever kind. In many instances of fractures of the inferior extremities, the perfectly straight position may undoubtedly be employed with the best success; but, in many others, and indeed by far the greater proportion, the flexion of the knee is infinitely preferable: such, at least, is the opinion of the great hospital surgeons of England and France.

The number of cases of erysipelas, in some of the hospitals of Italy, is very great. They are treated invariably on the antiphlogistic system. In severe cases of the acute phlegmonoid erysipelas, bleeding, to the extent of eight or ten ounces, is practised, and purgatives and the kermes mineral are exhibited. The stimulating plan is, I believe, never employed; and Mr. Lawrence's method of incision is unknown. Where gangrene, however, has supervened, the Italian surgeons frequently make small scarifications, with the view of favouring the separation of the dead parts from the living. Their practice, as will be readily admitted by every enlightened

* I here speak more particularly of the practice at Rome.

surgeon, is founded on correct views of the disease, and is eminently successful.

In the treatment of aneurism, the Italians seem to be exceedingly far behind. Their surgeons are timid, and unwilling to adopt those bold but successful operations which have shed such a brilliant lustre over the English surgery of the present century. During the time I spent in Italy, I did not hear of a single case where even the simpler operations for aneurism had been adopted; and many of the more difficult ones, but which are yet successfully employed in England, are unknown. Thus the ligature of the subclavian and external iliac arteries — operations which, it may almost be said, are in daily use in England — have never yet been attempted in Italy. The treatment of aneurisms consists commonly in palliative means. Compression is the most powerful of these, and it must be allowed is often employed with great advantage, and occasionally so as to effect a complete cure. It appears to me that this remedy is greatly too much neglected in England, and that surgeons, led away by the *éclat* of brilliant operations, do not pay sufficient attention to more simple and less dangerous means, and which are yet often completely successful. The method of Professor Sisco, already alluded to, is that generally adopted. I had an opportunity of seeing three cases of aneurism, under the care of M. Flajani, in the hospital of Santo Spirito, treated in this way, and which seemed to be undergoing a process of cure. They were all incipient forms of the disease.

The method of tying arteries recommended by the veteran Scarpa, has now fallen into disuse.

Different operations are performed for lithotomy in the different hospitals of Italy. In Tuscany, and particularly at Florence and Pisa, the barbarous operation of the gorget is in general use. At Milan, the *bistouri cachée* of the French is commonly employed; and at Rome, the simple operation with the knife, nearly as practised by Cheselden, is that adopted. In all these schools, the surgeons agree in one point, that of making the external incision remarkably small. The fatality of the operation is said to be about three deaths in twenty throughout Italy.

If the stone be large, the rectovesical operation of Vacca is preferred

to the high operation, which is at present scarcely ever practised in Italy. The operation of M. Civiale for “*la broiement de la pierre*,” and which certainly in a great number of patients may be employed with advantage, has not yet been introduced into use in Italy. In cases of stone in the female bladder, the operation by incision is adopted in preference to that by dilatation.

The operations for hernia are performed in Italy nearly in the same manner as in England, with this difference, that they are commonly performed too late. Two cases came under my notice at Rome, where a strangulated inguinal hernia had existed for three or four days when the patients were admitted into the hospital. The operations were not performed, in one for twenty-four, and in the other for thirty-six, hours after, and in both the gut was found gangrenous, and death ensued.

The venereal disease, which bears in Italy precisely the same characters which mark its progress in England, is treated in a very mild, judicious, and efficacious manner. In cases of primary sores, calomel and blue pill are exhibited in small doses. When the constitution is tainted, the oxymuriate of mercury is given to the extent of the sixth of a grain for a dose*. These preparations are administered with much care and caution, and are never continued to such a length of time as to injure the constitution. Decoctions of sarsaparilla and sassafras, and other herbs of a similar nature, are given in conjunction with them, and the patient is enjoined a moderate, and frequently milk, diet.

Cases of venereal disease are by no means so common as in England; nor have I ever seen, in any part of Italy, such extensive ravages from the disease as in Britain. In general the regulations of the police are extremely severe against women contaminated with this disease, and in the Papal dominions no prostitutes are permitted: the moment females are discovered exercising this infamous profession, they are thrown into prison.

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Observations and Experiments on Mercurism. By RICHARD CHENEVIX, Esq. F.R. & E.S. M.R.I.A.

The object of this paper is said to be

* This is particularly praised by Professor Tagliabo.

to turn the public mind toward this powerful agent, "so true, yet so much despised;" and to engage some inquirers to lay aside their preconceptions for a moment, and to have recourse to *fair* experiment. For this purpose a variety of cases are related, and authorities quoted; but as these differ in nothing from many already recorded, and as we suspect that no man will be converted by the evidence they afford, we deem it unnecessary to detail them.

Hints on the associated use of Oil of Turpentine and Mercury. By JOHN WILSON, M.D. R.N.

Dr. Wilson is of opinion that when calomel and oil of turpentine are given in combination, the latter, under proper management, accelerates the action and increases the curative power of the former. The author does not refer exclusively, nor even principally, to ptyalism; but to excitement of the general capillary system, whether secreting or unsecreting, in which he believes its remedial power, at least in febrile disease, mainly to consist. He thinks that the combination in question, like compound purgatives, has greater effect than individual remedies taken separately; and that the turpentine, in such cases, does not act simply as a "non-cathartic stimulant," but that it co-operates directly with the mercury in the remedial process, and contributes a part to the sanative effect.

It often happens that when we are anxious to excite the constitutional action of mercury, we find it difficult or impracticable to do so; and if turpentine possess the power alleged, it must be admitted to form a valuable auxiliary in combating some very serious forms of disease.

The turpentine is given in doses varied according to circumstances; so managed, however, as not to act sensibly on the intestines, and not to produce more than a slight degree of strangury.

Several cases are related in which the use of calomel was followed up by moderate doses of turpentine (about ʒij.), and in which the gums were speedily affected. In one of these a patient had ʒj. of calomel in the course of a few days, without affecting the mouth: in a subsequent attack of a similar nature ʒj. of calomel, associated

with oil of turpentine, brought on salivation. This is the only case which appears to us to have any weight—*valeat quantum*.

On East Indian Opium. By JOHN WEBSTER, M.D. Physician to the St. George's and St. James's Dispensary, &c.

The only information in this communication in addition to what we gave at page 712 of the preceding volume, is contained in a letter from Dr. A. T. Thomson, which we subjoin:—

"The specimen of East Indian opium which you gave me possesses many advantages over all the other specimens of that variety of opium that have come under my observation: it is cleaner, has a higher narcotic odour, and is more soluble in water at the temperature of 60° Fahrenheit than the ordinary Indian opium. One disadvantage, at least as far as relates to its analysis, or as forming a source of the salts of morphia, is the large quantity of colouring matter which it contains. It was submitted to the following analysis:—Four hundred and eighty grains were rubbed up with three pints of distilled water, and macerated for 24 hours; the solution was then filtered, and the meconiate of morphia contained in it decomposed by ammonia, which threw down the morphia, in combination with the colouring and some gelatinous matter. This precipitate, well washed, was mixed with a few ounces of distilled water, and converted into an acetate by the addition of pure acetic acid. It was next freed from the colouring matter, by mixing it with animal charcoal deprived of its salts; and, the solution being filtered, was again decomposed by ammonia, added in excess. The morphia thus precipitated was first washed with weak spirit, in order to free it as completely as possible from colouring matter, and then treated with strong boiling alcohol. I send you the result. The crystals are not so white as they would be, were they dissolved again and recrystallized; but I was anxious to lose as little of the product as possible. I have not weighed the salt; and, in leaving this to you, I think you may allow three or four grains for loss.

"I am of opinion that opium, pre-

pared in India with the care that has evidently been bestowed upon this specimen, cannot fail to find a ready market in Europe. It is not likely to surpass the opium prepared in Persia, the Turkish opium of the European market; but, if it never can attain to the same degree of excellence, on account of climate, still it will be a valuable article if it come near it in quality.

Case of Scarlatina, from Monthly Report of Prevalent Diseases.

A young lady, aged 16, was exposed to cold about ten days after the desquamation of the cuticle, subsequent to the eruption. She was at this time rapidly recovering her general health, which had been much subdued by the severe though short disease she had passed through. In a few hours after she complained of having "caught cold," and of feeling an uncomfortable stiffness of the neck, head-ache, and slight feverish symptoms. The next morning, the whole of the anterior part of the throat was highly inflamed, particularly the integuments over the lower part of the left sterno-cleido-mastoideus muscle. The patient appeared dull and heavy, and towards evening she became nearly comatose. She was roused even by a loud noise but for a moment, and the only expression of complaint that could be drawn from her was, that her hands and legs were very painful. They were slightly anasarcaous, as was also the face. In this state she remained for three or four days, and it was concluded from the symptoms that effusion had taken place into the ventricles of the brain, and a guardedly unfavourable prognosis was given. A well-defined phlegmonous abscess had in the meantime formed nearly over the thyroid cartilage, which was opened on the fifth day from the first appearance of the external inflammation, and about four ounces of well-conditioned pus was discharged. From this time the symptoms of cerebral oppression gradually subsided, and the patient slowly recovered. The treatment adopted upon the first appearance of the comatose symptoms consisted of active purgatives, cold evaporating lotions constantly applied to the shaven scalp, a blister between the shoulders, and pills of squill, digitalis, and calomel. The

general condition of the patient appeared to contraindicate the abstraction of blood.

MEDICAL GAZETTE.

Saturday, June 20, 1829.

"Licet omnibus, licet etiam mihi, dignitatem *Artis Medicæ* tueri; potestas modo veniendi in publicum sit, dicendi periculum non recuso."—CICERO.

TRIAL OF MR. VAN BUTCHELL FOR MANSLAUGHTER.

THIS trial took place at the Old Bailey last Wednesday, when the prisoner was acquitted.

Manslaughter consists in "the unlawful killing of another without malice, either express or implied:" and the act may be committed voluntarily, as from sudden and great provocation; or involuntarily, and when this is the case, to bring it under the description of manslaughter it is necessary that the event should happen in the commission of some "unlawful act." The crime amounts to felony, but within the benefit of clergy; and according to law, the offender is to be burnt in the hand, and to forfeit all his goods and chattels: in a word, in the gradations of guilt connected with the destruction of human life, it stands next to murder. How far, then, is a medical practitioner liable to these pains and penalties, in whose hands a patient dies as an immediate and direct consequence of remedies administered or of an operation performed? The following extract from Blackstone (vol. iv. p. 197) will answer this question: "If a physician or surgeon gives his patient a potion or plaister to cure him, which, contrary to expectation, kills him, *this is neither murder nor manslaughter, but misadventure*, and he shall not be punished criminally, however liable he might have been formerly

to a civil action for neglect or ignorance." The law is here laid down so explicitly that it appears extraordinary any doubt should have been entertained on the subject: the cause of this doubt, however, as applied to the present instance, is explained by the clause which immediately follows that we have just given: "But it hath been holden, that if it be not a *regular* physician or surgeon who administers the medicine, or performs the operation, it is manslaughter at least. Yet Sir M. Hale* very justly questions the law of this determination, since physic and salves were in use before learned physicians and surgeons; wherefore he treats this doctrine as apocryphal." Although it thus seems that a difference was held to exist by some of the old authorities, in the application of the law to regular and irregular practitioners, yet this is contradicted by subsequent and more weighty authorities; in addition to which, it was stated by Mr. Baron Hullock as his opinion, that it made no difference whether the practitioner was regular or irregular; and he added that there was no instance on record in which either had been tried for manslaughter in consequence of real or alleged bad practice.

As it is not against the law for a person, coming under the description of irregular, to practise surgery, so it appears quite obvious that, were he to kill all his patients, he would still be guiltless of manslaughter, because, to constitute this, the accused must have taken away life by "the commission of some unlawful act." A physician practising in London, and, *we believe*, in the country, without a license, may be proceeded against at law; and the same applies to an apothecary; but we are not aware that the College of Surgeons have the power of prohibiting any one

from practising, or interfering with him: so that no one practising surgery according to the best of his skill, is committing "an unlawful act," and therefore he cannot be guilty of manslaughter.

An occurrence such as that which formed the ground of the present prosecution, as it appears to us, cannot possibly amount to more than that kind of excusable homicide, which is called homicide *per infortunium*, or misadventure—"when a man doing a lawful act, without any intention of hurt, unfortunately kills another." Even this alleviated case of "misadventure," however, is not faultless in the eye of the law, as it implies negligence, or a want of sufficient caution, on the part of him in whose hands it occurs. When we apply these observations to the case before us, it is obvious that the charge of manslaughter was perfectly untenable, and the acquittal of the prisoner not only an act of justice to the individual immediately concerned, but to the profession in general. People do not make very nice distinctions between regular and irregular practitioners; and if the accused in this instance had been convicted, we should soon have had abundance of such prosecutions. We deem the case of sufficient importance to be recorded in our pages, and have therefore subjoined a report of the proceedings. One good will result from them at all events: they will inspire caution both in Mr. Van Butchell and in the public.

OLD BAILEY, WEDNESDAY.

(Before Mr. BARN HULLOCK and Mr. Justice LITLEDALE.)

Edwin Martin Van Butchell, surgeon, was indicted for the manslaughter of William Archer. This case excited great interest, and the Court was crowded to excess at an early hour.

Mr. Brodrick and Mr. Carrington appeared on behalf of the prisoner.

Mr. Adolphus stated the case for the prosecution. The prisoner was indicted for what was termed manslaughter—that was, causing

* In Mr. Baron Hullock's charge to the jury, which will be found at p. 93, the words of Sir M. Hale are quoted.

the death of the deceased by the unskilful and improper manner in which he performed an operation upon him for a disease of the intestines, under which he was labouring. They would find that the deceased had been attended formerly by a gentleman of eminence in the profession, and who was legally qualified to practise; but that he had subsequently gone to the prisoner, Mr. Van Butchell, who was not a legally qualified practitioner, and that he had performed an operation upon him in so unskilful a manner, as to have occasioned an injury of such a nature as to cause his death. The Learned Counsel then detailed the whole of the circumstances of the case, and was quoting the opinions of Lords Hale and Coke, as applicable to it, when

Mr. Baron Hullock interrupted him, and requested him to confine himself to the text, for there had been no decision in the cases in question.

The following witnesses were then examined:—

Mr. Emmerson Archer stated that he was the brother of the deceased, and was a silk-manufacturer. He remembered the 10th May, when his brother asked him the way to Golden-Square. He did not believe that before that day his brother was afflicted with an internal disorder. His brother had not said before that day that his inside was disordered. On that day he was in better spirits than usual. He went to Golden-Square, where the prisoner lived, and when he returned home he laid himself on the sofa, and was so ill, that he was unable to rise from it again for some time. That was about two o'clock. He came down stairs to dinner, but was in a state of great agitation; and about five o'clock became so ill, that witness was obliged to help him up stairs, and put him to bed. He kept getting worse every minute, and witness sent for *Mr. Lloyd*, his former medical attendant. *Mr. Lloyd* arrived about eight o'clock. Witness knew that his brother believed that he was dying. He said that "he had received such injury, that he thought he should not recover." This was about Thursday. On the 16th of May he settled all his worldly affairs, and died in a few hours after.

Cross-examined by *Mr. Brodrick*.—His brother went to *Mr. Lloyd* perhaps two or three times within the month; his spirits were better. His brother had lost his wife; he did not know that she had died of a fistula. Witness was at the inquest; *Mr. Van Butchell* was not there. The verdict was returned without his being there. *Mr. Salmon* came with *Mr. Van Butchell's* attorney, and requested to see the body; that was on the day it was about to be buried; they could not let them see the body; they did not see it; the application was made on Friday; he did not know that a previous application had been made; there was a paper brought from the Coroner on the Saturday, the day after the funeral.

By *Mr. Baron Hullock*.—His brother walked to the first coach-stand, and then rode home.

Mr. Lloyd, surgeon, of Frederick-Place, Old Jewry, saw the deceased on the 10th of May; he had seen him three or four times before; he complained of great pain of mind and body, and said, "he had received such an injury that he should never recover—that he had received such an injury in the bowels that he should die." There were not, at that time, such symptoms as would have led witness to suppose that the deceased's death was so near. The deceased laboured under very great depression of body and mind. Witness had several other conversations with him before he died, and, from his expressions on those occasions, the witness was of opinion that the deceased thought he might die, but not that he was fully aware that his immediate dissolution was certain.

Mr. Baron Hullock here said, that whatever the deceased might have said, if he did not believe at the time he said it that his death was approaching, could not be received in evidence.

[*Mr. Lloyd* then proceeded to state the result of his examination of the body.] The general appearance of the viscera was that of recent inflammation, and much greater at the lower parts; and on examining the upper part of the rectum, which was a portion of the intestine adhering, he found that a part of the rectum had been injured. He separated the injured part. *Mr. Smith* and himself being the only persons present, he was anxious that other persons should have an opportunity of seeing it. He examined it over and over again, and was fully convinced that the injury was occasioned by violence—an instrument, six inches long, and straight, would have caused the injury—a similar accident was occasioned by such an instrument in an hospital recently.

By *Mr. Brodrick*.—The instrument was used in that case by the nurse. She was not prosecuted. There was an inquest held. His examination did not lead him to think that there was general peritoneum inflammation. He prescribed bleeding. He did not bleed him—he begged pardon, he did bleed him. Leeches were also applied. He could not say what quantity of blood was taken. Blood was taken from the arm on the Tuesday; he thought about sixteen or eighteen ounces. He bled him again on the Wednesday. He took the part adhering partly by the hand and partly by the cutting instrument. The rectum is usually about seven or eight inches, not ten or eleven inches. The adhesion was at the upper part, in a straight line, which was about four inches up. The rectum was curved.

The witness here emphatically objected to *Mr. Brodrick's* mode of cross-examination, and said it must tend to mislead and confuse the jury.

Mr. Brodrick.—You will not mislead the jury, sir, if you answer the questions I put to you.

Cross-examination continued.—Witness believed he had said something before the Coroner about the instrument having entered in a straight line, but he would not swear it. He had got the part which had been injured with him, and there were gentlemen present who were competent to judge of the injury. In his opinion it was unsafe to use a straight metallic bougie of six inches in length. He had never seen one of that length used at the hospitals—not an unyielding one. He had great practice in this sort of cases, and he could confidently say that no properly-educated surgeon would use a straight unyielding metallic bougie of such a length. Mr. Salmon called and told him that he was going to see the body, and he (witness) said it was of no use, as he had the part there—he took the injured part away the evening of the day on which the deceased died. In his opinion the rectum was not usually ten inches long—it was impossible. In many instances the rectum was remarkably strong, but it varied much—in a natural state it could be greatly distended, but in an inflamed state it cannot. He thought that it was three months previous to the Sunday, the 10th May, that he had seen the deceased. Operations sometimes fail, even when performed by a skilful surgeon. He recollected the case of Mary Kent; he operated upon her in the hospital. He took off her breast—she was pregnant—she died. Whether he had done right had been questioned by some; he, however, still considered that he had acted right, and so did many others—she died from another cause; he was not indicted for manslaughter. He was a member of the College of Surgeons. He believed that the prisoner was not. He thought that a man with such an injury could walk. If the cellular membrane was perforated by a blunt instrument, he thought blood would not flow—it was possible, but he thought it not probable. He thought that the hole in the rectum was the largest inside. He did not use any injection; he judged it imprudent to do so, believing the intestine to be perforated; it would have been highly dangerous. He did not bleed the deceased sooner, because the depression of mind and body was such, when witness was first called to see him after he had received the injury, that bleeding would have been certain destruction to him.

Mr. Baron Hullock here asked Mr. Adolphus if he had evidence to carry the case further; that was, stronger evidence than had been already given.

Mr. Adolphus said he had not.

Mr. Baron Hullock said that, if that were so, in his opinion there was no case made out. The evidence which had been given could not support the charge of manslaughter.

Mr. Brodrick hoped that his lordship would

allow him to say that he had witnesses to prove that Mr. Van Butchell was a gentleman who had practised with the greatest skill for a number of years, and that the instrument he had used was such a one as the most eminent surgeons of the age were in the constant practice of using, and he had nearly forty witnesses in attendance who had been cured by Mr. Van Butchell, all of whom would speak of his skill in the highest terms. He had also proof of Mr. Van Butchell's being a regularly educated surgeon.

Mr. Adolphus said that, as his lordship had given the opinion which he had, he (Mr. Adolphus) on the part of the prosecution, would not attempt to carry the case further.

Mr. Baron Hullock.—There is no evidence of any instrument whatever having been used, neither is there any thing like evidence to maintain a charge of manslaughter. His lordship then proceeded to say, that if such an indictment could be supported, in the total absence of all evidence of want of skill or neglect, because an operation failed, the consequences would be most serious, whether the operation was performed by a regular or an irregular surgeon; and surely it would be most unjust to prosecute a man who might be a skilful and clever practitioner, upon the unsuccessful result of a dangerous operation, because he was not licensed, and not fortunate enough to possess the sanction and authority of a certain body in this town. If such a doctrine could be maintained, very many persons in remote parts would be unable to procure any assistance; for who would exercise their best skill, of whatever quality it might be, if in the case of failure they were to be subjected to an indictment for murder or manslaughter? It was somewhat remarkable that there was not a single decision on the point, which must show that all the most eminent lawyers had strong doubts of the propriety of such prosecutions, and that it was their uniform opinion. They were not for the first time to be told that operations would fail, but it was too much to say that, because they failed, the parties were to be subjected to a prosecution. What had been quoted from Blackstone was, in fact, a copy of what Lord Hale had said of cases of this description; but the words of his lordship would not bear a construction unfavourable to the person accused; it went to a direct and opposite tendency. The words of his lordship were, "If a physician gives a person a potion without any intent of doing him any bodily hurt, but with an intent to cure or prevent a disease, and, contrary to the expectation of the physician, it kills him, this is no homicide; and the like of a chirurgeon; and I hold that opinion to be erroneous that thinketh if he be no licensed chirurgeon or physician that occasioneth this mischance, that then it is felony; for physic and salves were before licensed physicians and chirurgeons, and therefore, if

they be not licensed according to the statutes of King Henry VIII. they are subject to the penalties in those statutes; but God forbid that any mischance of this kind should make any person not licensed guilty of murder or manslaughter." Cases might and did occur where the parties recovered damages in a civil action for unskilful conduct; but God forbid that any person, under such circumstances, should be subjected to an indictment for murder or manslaughter; for, in that case, many would die for want of help, the helpers well knowing that, if they failed, they would be liable to such an indictment. He did not mean to impute to Mr. Lloyd any unskilfulness. Although it had been shown that an operation which he had performed had failed, that operation might have been performed most skilfully; yet they had heard that there was a difference of opinion respecting it, but that difference of opinion might, probably, arise more from the situation of the patient, and as to the time of performing it, the woman being in a state of pregnancy, than from any unskilfulness. Surely, gentlemen, there can be nothing so dangerous as to say that a person should be subjected to an indictment when an operation unfortunately miscarried. In the present case there was not any evidence that the accused had done otherwise than exercised the greatest skill, and acted to the best of his judgment. His Lordship concluded by saying, I am of opinion that there is no ground for supporting the offence of manslaughter, and that there is not the slightest imputation cast upon the gentleman at the bar. Your duty will, therefore, be to find a verdict of acquittal.

The Jury, without hesitation, pronounced a verdict of *Not Guilty*.

HOSPITAL REPORTS.

DUBLIN LYING-IN HOSPITAL.

Cases of Puerperal Fever, treated by Dr. Collins.

Ward, No. 1, Feb. 9, 1829.—Mary Marlow, æt. 30, was delivered of her first child, at 4 A.M. on the 7th instant, after a labour of eleven hours.

She remained quite well (except that she was labouring under a severe cough on admission) until this morning at half-past eight, when she began to complain suddenly of pain in the abdomen, and there was much tenderness on pressure. She was ordered at this time a draught of castor oil and oil of turpentine, and to be well stuped.

10 o'clock, A.M.—Pulse 130; tongue moist, and tolerably clean; abdomen rather full, and considerable pain on pressure. Draught has operated well.

Three dozen of leeches to the abdomen, and afterwards a warm bath. To take a powder containing four grains of calomel and four of ipecacuanha every second hour.

4 P.M.—Bowels have been well opened. Abdomen much softer, but pain on pressure very considerable, particularly in the region of the uterus. Vomited frequently. Has taken three of the powders.

Three dozen of leeches and bath to be repeated. Powder to be discontinued. To take a pill every second hour, containing five grains of calomel and a quarter of a grain of opium.

9 P.M.—Pulse 114. Tongue moist, and tolerably clean. Abdomen rather full, and pain on pressure very acute over the uterus. Bowels well opened. Took three pills. No vomiting. Slept about three-quarters of an hour since she came out of the bath; drank about one pint. Abdomen to be covered with a blister. Pills to be continued every second hour. Inside of the legs and thighs to be rubbed with strong mercurial ointment.

10th, 9 A.M.—Pulse 126. Tongue moist, but more white. Blister has not yet risen well. Bowels twice partially opened; feels more easy; slept well. Complains of much weakness; drank better than two quarts; took six pills. Blister to be dressed at twelve o'clock with strong mercurial ointment. Pills to be continued 2dis horis; to have an injection thrown up immediately.

9 P.M.—Pulse 130. Tongue moist. Abdomen soft, but still has acute pain in the uterine region. Took six pills. Bowels three times opened. Stools greenish and watery. Drank about one quart. Slept about four hours. Complains of great distress when she coughs or moves in the bed. To be put into a warm bath. Pills to be continued every second hour. Abdomen to be dressed with simple ointment when taken out of the bath.

11th Feb. 10 A.M.—Pulse 132; tongue moist, slightly loaded; abdomen soft; pain on pressure still very acute over the uterus; bowels twice opened; has had incessant vomiting since one o'clock this morning, of a dark brownish fluid; drank about three pints; took six pills, three of which were rejected. Slept none.

Pills to be discontinued. To take a grain of opium in powder, and four grains of calomel, immediately; and afterwards to take four grains of calomel, $\frac{1}{4}$ grain of opium, 2dis horis. Mercurial friction to be continued diligently. To have \mathfrak{z} viiij. of the saline effervescing draught, with 60 drops of laudanum, and some chicken broth.

9 P.M.—Pulse 130, and much more feeble. Tongue tolerably moist and clean. Abdomen full, and uterus continues much enlarged and hard. Took six powders. Has had no vomiting since three o'clock. Has had three injections. Bowels but once opened. Drank about three pints. Talks very incoherently, and her strength is becoming greatly exhausted. To take four drachms of castor oil and four of oil of turpentine. Powders to be discontinued and pills to be resumed.

To be stuped frequently, and an injection to be thrown up every hour, until the bowels are well opened.

12th, 10 A.M.—Pulse quite imperceptible; strength nearly exhausted; slept none, and talked incoherently the entire night. Took six pills; bowels frequently opened; drinks little. To have a little beer, which she wishes for.

She expired at two o'clock this day.

Ward, No. 5, February 14, 1829.—Alice Toole was delivered of her first child (a boy) at eleven o'clock P.M. on the 11th instant, after a labour of six hours. She remained quite well until three o'clock A.M. on the 14th, when she was suddenly seized with pain in the abdomen. (She had been brought to the hospital, twenty miles, on a common car, and had been in a bad state of health during the time she was carrying the child.)

When taken ill this morning, the pulse was much hurried, 132, and the abdomen was exquisitely sensible to pressure. Her bowels had been well opened the preceding day, by castor oil. She was now ordered a draught of castor oil and oil of turpentine. To have four dozen leeches applied to the abdomen, and to be put into a warm bath.

9 A.M.—Pulse 132, small and weak; tongue moist and clean. Oil draught was thrown off the stomach. Abdomen soft, but pain on pressure not relieved. Stomach more settled. Oil draught to be repeated. To be frequently stuped, and to take a pill containing five grains of calomel and a quarter of a grain of opium every second hour.

12 o'clock A.M.—Pulse 132; abdomen quite soft; pain most acute; bowels twice opened partially; vomited part of the oil draught; countenance pale and sunk.

Three dozen of leeches and bath to be repeated. Pills to be continued every second hour, and injections with turpentine to be thrown up frequently, until the bowels are well opened.

9 P.M.—Pulse so quick and indistinct as not to be counted; tongue moist and clean; abdomen quite soft, but pain on pressure, although somewhat relieved, yet still extremely acute. The abdomen was covered with a blister at four o'clock. Bowels frequently opened within the last hour. Has taken nine pills; drank four quarts. Has vomited twice within the last hour. Pills to be continued every second hour.

15th Feb.—She died this morning at five o'clock, after 26 hours illness.

On dissection, a considerable quantity of sero-purulent fluid was found in the abdomen. The peritoneal coat of the intestines was less vascular than usual (*in such cases*, ought to be added, for it was very vascular). The uterus, ovaries, &c. were quite healthy. In the cavity of the chest numerous adhesions of long standing were found, and a few spoonfuls of bloody serum. The peritoneal

covering of both cavities was very vascular*.

Ward, No. 3, Feb. 20, 1829.—Bess M'Carty, aged 36, was delivered of her eighth child (a boy) at 6 o'clock A.M. on the 19th, after a labour of one hour.

She was attacked, at half-past eleven o'clock last night, with slight pain in the abdomen, and tenderness on pressure. She had a powder containing four grains of calomel and eight of jalap, some hours after delivery, followed by infusion of senna with Epsom salts and tincture of jalap, which had not operated freely.

She was ordered an injection with turpentine, and to be well stuped. The pain of abdomen, however, increased rapidly, and in half an hour was extremely acute. Pulse 104; tongue tolerably clean. Four dozen of leeches to be applied to the abdomen, and stuping to be diligently continued. Injection had emptied the bowels freely.

She was much relieved by the leeching and stuping, and slept tolerably well until six o'clock this morning, when she was again attacked with acute pain in the abdomen, with great tenderness. Pulse 120, and feeble. She was ordered six drachms of castor oil and six of turpentine, and stuping to be continued; and after the bowels have been opened, to take a pill containing five grains of calomel and a quarter of a grain of opium every hour. To be put into a warm bath at 8 o'clock, and permitted to remain in it as long as she finds it agreeable, and the entire of the abdomen to be covered with a blister when taken out.

9 A.M.—Pulse 120, and so feeble as scarcely to be felt; not perceptible in the left wrist. Abdomen tolerably soft, but full, and pain still very acute; was very weak after the bath, but felt somewhat easier. Bowels have not been opened by the draught. Countenance sunk. Turpentine injection to be thrown up; one of the pills to be taken 2dis horis.

9 P.M.—Pulse about 130, but so feeble as scarcely to be felt. Tongue quite moist, but slimy and white. Blister has risen well. Bowels have not been open since eleven o'clock, A.M.; has taken five pills; slept none; drank about one quart. Pills to be continued 2dis horis. Blister to be dressed immediately, and an injection with turpentine to be thrown up. To have some wine negus.

21st, 10 A.M.—Pulse imperceptible; tongue moist, loaded, and slimy; abdomen soft, and little pain on pressure; bowels open six times; drank four quarts; constant vomiting; slept none; strength rapidly sinking. To have chicken broth and wine whey, at pleasure.

She died a few minutes past eleven o'clock, A.M., after 36 hours illness.

* Dr. C. means serous (lining) covering of the parietes of the two cavities.

On dissection, not more than two or three ounces of a bloody serum was found in the cavity of the abdomen, no lymph whatever; and the intestines and peritoneum every where exhibited little if any vascularity. Chest healthy. She was a poor starved creature.

Ward, No. 2, Feb. 20, 1829.—Sophy Farrel, æt. 31, was delivered on the 18th, of her second child (a boy), at 11 A.M. She was quite well from this time until 2 A.M. on the 20th, when she was attacked with shivering. At this time the abdomen was full, the uterus hard and enlarged, and obscure pain on pressure.

She was ordered to take a powder, containing gr. iv. Calomelanos, and gr. iv. Ipec. 2dis horis.

9 P.M.—Pulse 126; tongue moist, and slightly foul; abdomen full; uterus still remains enlarged and hard, and pain on pressure increasing. Bowels five times opened. Took two powders. To have three dozen of leeches to abdomen, and afterwards a warm bath.

To take ʒj. Calomel. 2dis horis.

21st, 10 A.M.—Pulse 138; tongue tolerably moist, and little loaded; complains of a bad taste in her mouth. Abdomen tolerably soft; uterus much enlarged, and exquisitely sensible to pressure. Took five powders. Bowels frequently opened. Drank about one quart. Slept none.

To be put into a warm bath. Abdomen to be afterwards covered with a blister. Powders to be continued 2dis horis. Expresses a wish for porter. To have a pint of porter.

9 P.M.—Pulse 134; tongue dry and parched. Blister has risen well. Pain still very distressing. Has taken five powders. Bowels three times opened. Gums not in the least affected by the mercury. Drank four quarts. Slept none.

The blister to be dressed immediately; powders to be continued.

22d, 9 A.M.—Pulse 134; tongue dry, and slightly furred; abdomen much softer, and pain on pressure much less. Took six powders; has had frequent vomiting since three o'clock this morning; bowels once opened; slept about three hours; drank about six quarts.

Powders to be continued, 3tiis horis.

8 P.M.—Pulse 138, and exceedingly small and feeble; tongue moistish, and red; abdomen full and tense; constant vomiting. Has taken three powders: the last had a quarter of a grain of opium added. Bowels were three times largely opened. Drank about three pints.

To have half a grain of powdered opium added to each of the powders, and chicken broth and saline draught.

23d, 10 A.M.—Pulse totally imperceptible; extremely cold and clammy; strength rapid-

ly sinking. Took five powders. Bowels frequently opened. Abdomen full; says she has no pain on pressure. Drank one quart of chicken broth through the night. Has had no vomiting since two o'clock. To have a little whey of wine.

She expired at 11 o'clock A.M., after an illness of 70 hours.

Her friends took her away, without an examination being made of her body.

She was sixty-nine hours ill, during which time she took 488 grains of calomel, &c. &c. without the slightest effect on the system.

Ward, No. 3, February 20, 1829.—Eliza Eldeos, 19 years of age, was delivered of her first child (a boy) at 2 A.M. on the 19th, after a labour of two hours.

She had been labouring under a severe cold before admission, and her tongue was white and loaded. Her bowels were remarkably well opened by the usual purgatives, and she remained easy until eleven o'clock in the evening, when she began to complain violently of pain in the abdomen and intolerance of pressure. She was ordered to be extremely well stuped; and, as the last draught of inf. sennæ with Epsom salts and tincture of jalap had not operated, an injection with turpentine was ordered, which freed the bowels well, and produced great relief.

She slept well, and felt easy at six this morning, but at eight the pain returned. Pulse 208; tongue white and dryish; abdomen soft, but full, and pressure causes much distress. Uterus large, and hard. Countenance anxious, and altogether much agitated.

Four dozen of leeches to the abdomen, and a warm bath afterwards; and to take four grains of calomel and four of ipecacuanha, every second hour.

8 P.M.—Pulse 108; tongue moist and slimy; abdomen more soft, and pain on pressure much less. Has taken five powders. Bowels have not been opened since morning. Drank about one pint. Feels easy when she remains quiet.

Powders to be continued 2dis horis. To be stuped occasionally.

21st, 9 A.M.—Pulse 130; tongue moist and slimy; abdomen soft, and complains little of pain on pressure; uterus large, and hard. Took eight powders. Vomited once. Bowels but once opened since she came out of the bath; slept well; drank about one quart. Gums evidently affected by the mercury.

Continue the powders after twelve o'clock, and to be put into a bath in the meantime.

8 P.M.—Pulse 132; tongue moist and slimy; abdomen soft; uterus much enlarged, and hard; pain on pressure very acute. Took three of the powders. Bowels twice opened. An eruption has appeared over the arms and about the chest, in distinct red spots, considerably elevated. Drank about a pint. Slept none.

Powders to be continued. Abdomen to be covered with a blister.

22d, 10 A.M.—Pulse 132, rather more feeble; tongue moist and slimy. Blister has risen remarkably well. Complains of much distress in her breathing, with cough. Bowels freed once or twice each hour. Eruption more extensive, now covering the legs and thighs. Dozed frequently. Stomach frequently rejected her drink. Gums considerably more affected with the mercury.

Discont. pulveres. Blister to be dressed immediately. To take four grains of plain calomel, 2dis horis.

8 P.M.—Pulse so feeble as not to be counted distinctly, about 130; tongue moist, slimy, and loaded in the centre; abdomen full, but not tense; pain on pressure remains considerable; breathing extremely laboured and quick. Took six powders. Has had frequent vomiting. Bowels repeatedly opened. Was ordered porter, which the stomach rejects. Eruption still more spread over the body.

To have chicken broth, or wine whey, at pleasure. Cont. pulveres.

Feb. 23.—She died at five this morning.

On dissection, a considerable quantity of straw-coloured serum was found in the cavity of the abdomen, mixed with lymph. The peritoneal covering of the intestines and parietes of the abdomen was extremely vascular. The uretus was healthy.

There was no effusion into the chest.

She was 78 hours ill, and was attacked 21 hours after delivery. She took 104 grains of calomel, by which her mouth was considerably affected.

Ward, No. 1, Feb. 20, 1829.—Catharine Morton, aged 22, was delivered of her first child (a boy) at half-past one o'clock P.M. on the 19th, after a labour of 60 hours, but during the first 40, the mouth of the womb was not dilated more than the size of half-a-crown, and the labour-pains very trifling.

Her bowels had been well opened during her labour, and at nine o'clock P.M. she was ordered a powder containing four grains of calomel and eight of jalap, which opened the bowels three times in the course of the night. At half-past seven o'clock this morning she began to complain of pain in the abdomen, which was greatly increased by pressure; the abdomen was full and rather tense; and pulse not much hurried. She was very restless and uneasy. Ordered 6 drachms of castor oil, and 6 of turpentine, and to be stuped for one hour with flannels, out of water as hot as she could bear.

10 A.M.—Pulse 108; tongue moist and white; abdomen full and tense, and much pain on pressure, particularly over the uterus. Oil draught has not operated. An injection to be thrown up immediately with turpentine. Four dozen of leeches to the lower part of the abdomen, and afterwards a warm bath. Then to take a powder con-

taining gr. iv. of Calomel, 4 gr. of Hippo. 2dis horis.

4 P.M.—Bowels once opened; abdomen full and tense; pain somewhat relieved. Took three powders. Calomel and ipecacuanha to be discontinued. To take one scruple of plain calomel every second hour.

9 P.M.—Is at present asleep—has been so for the last hour. Has taken two of the powders. Bowels five times opened since the morning. Drank about two quarts. Powders to be continued.

21st, 10 A.M.—Pulse 126; tongue moist, and slightly white; abdomen being much distended, and pain very acute. A blister was applied this morning at four o'clock to the abdomen. Took eight powders; gums slightly, if any thing, affected. Bowels four times opened. Drank three quarts. Slept about four hours. Powders to be continued 2dis horis.

1 P.M.—In consequence of vomiting setting in, the scruple doses of calomel were omitted after the third dose, and saline draught \mathfrak{z} vij. with T. Opii gtt. was desired to be occasionally administered.

9 P.M.—Pulse 130, and more feeble; abdomen greatly distended, and pain very acute; vomiting still continues incessant, accompanied with great thirst; bowels constantly opened. To have 4 gr. of calomel with half a grain of opium, powdered, every hour till the stomach settles.

22d, 10 A.M.—Pulse so indistinct as almost not to be felt; is sinking rapidly; stomach rejects every thing; took five powders; bowels twice opened. To have some wine whey.

She died at half-past twelve this day.

On dissection, not more than four or five ounces of a bloody serum were found in the abdominal cavity, nor was there the slightest deposit of lymph.

There was not much vascularity of the intestines; but the mucous coat, in several places, was covered with a black deposit, perhaps from the effects of the calomel; but the structure was in no way injured by it. Stomach healthy. The uterus itself was healthy; but the broad ligaments and fallopian tubes contained some pus.

She was 53 hours ill; took 292 gr. of calomel, &c. &c.

NOTICES.

Many thanks to our correspondent at Bath. We shall make use of his paper in an early number, and will be happy at all times to receive similar contributions, especially in the department with which we are fully aware he is intimately acquainted.

Having inserted the letter of Mr. Clapper-ton last week, that of Mr. Jackson is rendered superfluous.

W. WILSON, Printer, 57, Skinner-Street, London.

THE LONDON MEDICAL GAZETTE,

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SATURDAY, JUNE 27, 1829.

ON THE

INFLAMMATORY AFFECTIONS OF THE BRAIN AND ITS MEMBRANES.

*Being the Substance of the Croonian Lectures,
delivered before the Royal College of Physicians,
in May 1829,*

BY FRANCIS HAWKINS, M.D.

Physician to the Middlesex Hospital.

[Continued from page 69.]

LECTURE I. *concluded.*

IN pursuance of the inquiry which has been proposed, we begin with *Inflammation of the Dura Mater*. That this membrane is capable of being separately inflamed, we have ample evidence from dissection: the appearance of the membrane itself, and the products of inflammation upon its interior or exterior surface, abundantly attest the fact. It appears, however, that inflammation commencing in the dura mater cannot long continue there insulated, but must soon be extended to the arachnoid and pia mater: so soon and so constantly has this extension been found to take place, that inflammation of the dura mater can only for a short time, if at all, be productive of peculiar symptoms which admit of being distinguished from those which attend inflammation of the other membranes.

When the dura mater is inflamed, the first effect, as is the case in all other textures, is an increase of its vascularity. Dr. Baillie has observed, that the fine vessels, filled with florid blood, in an inflamed dura mater, "are seldom so crowded as in most other parts of the body when inflamed, which arises from the nature of the membrane itself. In its natural state there are few blood

vessels ramifying through it; and, therefore, when it is inflamed, it does not appear so much crowded with vessels as other parts do which are naturally more vascular."—(Morb. Anat. p. 441.)

However, the morbid increase of its vascularity is certainly sometimes highly conspicuous, as may be seen in a specimen which Dr. Hooper has caused to be engraved (pl. i.); and to account for the comparative infrequency of such specimens, Dr. Hooper has justly remarked, that "this appearance of the internal surface of the dura mater is rarely met with, because the disease generally proceeds much further before it kills, and a quantity of serum, or an albuminous fluid or pus, is effused, and the morbid vascularity, so beautifully represented in this plate, is not discernible."

Dr. Baillie has said that it may be considered as a kind of peculiarity belonging to the membranes of the brain, that coagulable lymph is seldom formed upon their surface during inflammation. Nevertheless, the dura mater is sometimes found to have contracted adhesions to the other membranes; and sometimes a layer of coagulable lymph is formed upon its inner surface. In such cases the adventitious membrane exactly resembles that which is formed upon the surface of an inflamed pleura or peritonæum.—(Pl. iv. fig. 1.)

Occasionally the albuminous secretion which has thus been thrown out, is formed into a membrane, which becomes completely organized by vessels shooting into it from the inflamed surface.—(Vid. Hooper, pl. ii. fig. 1 and 2.)

Instead of adhesions being formed between an inflamed dura mater and the arachnoid membrane, it is more com-

mon to find serum effused there; and sometimes pus is secreted in the same situation, especially when the inflammation of the dura mater is the consequence of external injury: in some instances of the same nature, a thin layer of pus is found between the dura mater and the bone.

Inflammation of the dura mater does not often take place as an idiopathic disease, but occurs frequently as a consequence of external injury. The symptoms in the two cases are not exactly similar, since in the latter case the inflammation runs a more rapid course, and is sooner communicated to other textures; there is, consequently, a corresponding increase in the intensity and complication of the symptoms.

Mr. Brodie has published, in the *Medico-Chirurgical Transactions*, a luminous and scientific view of the effects of injuries of the head, antecedent to the occurrence of inflammation; and whenever the same enlightened and unprejudiced pathologist redeems his pledge of imparting to the public a second series of observations relating to those more remote consequences of injuries of the head, which are connected with inflammation of the brain and its membranes, he will confer upon science a great and acceptable service.

The symptoms which immediately follow injuries of the head, and before inflammation can be excited, are referred to three causes—*Concussion*, *Compression*, and *Wounds of the Brain*.

When we recollect the nature and severity of the symptoms that belong to *Concussion*, and consider that a morbid state of the brain capable of producing such symptoms altogether escapes detection; and is wholly imperceptible by our senses; that when an opportunity of examination has been afforded by the death of a patient after concussion, the most expert anatomist is unable to discover any thing different from their natural appearance in the existing state of the brain and its membranes, or to trace the slightest vestige of any preceding derangement of their structure;—when, I say, we consider how unsatisfactory is our examination of such a case, we might almost be tempted to fling away the scalpel in despair, and desist from exploring, with our feeble powers of vision and inadequate means of observation, the pathology of an organ so minute as the brain in its

texture, and so mysterious in its operations. But further consideration will teach us to limit our expectations, and thus to avoid disappointment; to bear in mind the true scope and end of our examinations of morbid parts, and to continue to turn them to their proper use, and to derive from them that instruction which they are capable of affording. The truth is, that what is termed morbid anatomy is conversant with the effects rather than with the causes of disease; nor is the failure of our observations with respect to concussion of the brain, greater than it is in numerous other cases. There can be no derangement of the functions of any organ of the body without a corresponding change of structure. But can we discover or trace the proximate cause of any derangement which we call functional? The very term expresses only the imperfection of our knowledge, and shews that the disorder of any part of the frame must be of some duration before its effects become perceptible by our senses.

Considerations such as these should send us back with redoubled ardour to the study of symptoms. When anatomy has disclosed to us the effects of disease, it is our business to assign the symptoms which have attended the previous process. But we have also effected something when, as in the case of concussion, the cause is given, and we are able to assign the peculiar train of symptoms which ensue.

It is not necessary here to describe the symptoms of concussion and compression of the brain; I will merely observe, that although we find nothing in idiopathic disease exactly similar to the state of concussion, the symptoms of *Compression* are nearly the same, whether it arise from external injury or internal disease—whether it be produced by depression of bone, by extravasation, effusion, or simply distention of vessels; and these symptoms occur at the close of almost every fatal case of cerebral disease.

It might be expected that wounds and injuries of the brain would shed the greatest light upon its physiology, and upon the uses of its different parts; unfortunately, however, this is not the case, and the reason is, that accidents of such a nature are almost always complicated with concussion or compression, so that we are unable to obtain the sim-

ple results of the destruction or separation of particular parts, there being at the same time a disturbance or suspension of the faculties of the whole organ, or rather system of organs. It has happened, nevertheless, that the brain has been penetrated, or even a portion of its substance lost, without the production apparently of any particular symptom. However, it is more common for wounds of the brain to produce an immediate effect upon the intellectual and motive faculties, manifested in a confusion of the intellect and slight convulsive twitches. It is an important fact, and one which is interesting also, as it coincides with the experiments and deductions of physiology, that wounds of the posterior lobes of the cerebrum, of the cerebellum, and medulla oblongata, are infinitely more dangerous than those of the anterior lobes of the cerebrum.

There are some cases of injury of the brain which have been followed by the loss or disturbance of a particular sense. Other cases have been followed by violent and general convulsions, occurring either immediately after the accident, or sometimes not till after an interval of a few days. These are attributed, and have occasionally been traced, to a particular source of irritation of the brain, such as a coagulum of blood, too small to create considerable pressure, or a splinter of bone. Convulsions, therefore, of this nature, are not unaptly compared to the symptoms of epilepsy. To causes similar to those last mentioned may be attributed also the furious delirium which is sometimes excited by an injury of the head. It is surprising how quickly and readily a symptom of such violence has been found to yield to copious blood-letting; but it must be repeated a second or third time if the delirium should recur.

The subject of inflammation of the dura mater has led us thus far into the consideration of the wounds and injuries by which it is so often produced. But as these belong to the province of surgery, and as they are fully treated of in the able paper in the *Medico-Chirurgical Transactions* to which I have before alluded, we shall return to the subject more immediately before us.

It has been stated that idiopathic inflammation of the dura mater is an exceedingly rare disease. Dr. Abercrombie has only met with one case in which this membrane, so often affected with

inflammation in consequence of disease or injury of the bone or pericranium, has appeared to be itself the seat of primary disordered action. As the case alluded to was one which, unlike those that are commonly met with, was not complicated with any other disease, we may derive from it a description of the symptoms which really belong to this disorder. The first symptom was, as usual, pain in the head, felt at first chiefly over the forehead, but afterwards extending over the whole head. There was also a feeling of confusion, similar to that which occurs when the brain is wounded. The constitution was affected with fever of a mild kind, and of the continued type. A swelling next appeared in the eyelid, from which matter was afterwards discharged; and it was ascertained, with the aid of a probe, that the bone was denuded in some parts over the orbit. Now this is a circumstance deserving of attention, for the same effect has appeared in other instances of inflammation of the dura mater, and it must depend, if not upon the direct communication established between the vessels of that membrane and those of the pericranium, at least upon the sympathy existing between them. But, as the bone was not diseased, the case is to be distinguished from those which are of far more common occurrence, in which caries of the bone is the original source of both the external and internal inflammation, and in which the abscess without communicates with one within. In the progress of this case, acute pain was felt in one ear; severe shiverings afterwards occurred, followed by heat and perspiration; and bark was prescribed in large doses. It has happened in too many instances to render it necessary to cite any other, that the shiverings of internal suppuration have been mistaken for those of ague: but, whatever may be said of the practice thereupon adopted, of giving bark, in cases in which the suppuration which it may promote is less injurious in its consequences; yet the least that can be said of it is, that it is a mode of treatment wholly inapplicable to cases of inflammation and suppuration within the cranium. The symptoms which next ensued were convulsions, with an increase of head-ache and of fever, and a state of delirium, which preceded death. Upon examination, the bone was found to be in a

sound state, but a good deal of pus was collected between it and the dura mater, in a space circumscribed by adhesions contracted between the two. The dura mater, though entire, was superficially ulcerated; in some places it was thin, in others considerably thickened. Beneath it, a thin layer of pus was spread over the whole of the right hemisphere of the brain, and under the arachnoid there was an extensive stratum of coagulable lymph, following the course of that membrane, and passing over the intervals between the convolutions of the brain—not dipping between them. The pia mater, between the convolutions, was highly vascular, but exhibited no appearance of any deposition. The cerebral substance of the right hemisphere was, to a slight depth, of a dark livid colour; but there was no effusion into the ventricles, nor any change of structure observable in any part of the brain.

In the foregoing description, we recognize a case of primary inflammation of the dura mater, which was subsequently extended to the arachnoid. Until that extension had taken place, we may presume that convulsions and delirium were not excited; because we shall find hereafter that these symptoms are characteristic of inflammation of the interior membranes. The only symptoms, therefore, which we could be justified in attributing exclusively to the inflammation of the dura mater, were the head-ache, sense of confusion, fever, shiverings, and external suppuration. If it be urged that these symptoms can scarcely be considered decisive, nor sufficient to indicate the nature of the disease, yet, on the other hand, it is to be observed that the character of the head-ache was somewhat peculiar—felt first in the forehead, extending afterwards to the whole head, but fixing itself especially in the ear. It is to be considered also that this head-ache was combined with fever, and succeeded by shiverings; then, without any apparent cause, an abscess was formed upon the frontal bone: surely the combination of these symptoms might induce us to conclude that inflammation existed within the cranium; and the character of the symptoms present, and the absence of others, of which we shall have occasion to speak hereafter, might tend to determine its situation, and go far to fix its seat in the dura mater.

The symptom just mentioned, of pain in the ear, leads us to the consideration of a species of inflammation of the dura mater of far more frequent occurrence than idiopathic inflammation of the same membrane—namely, that which is produced by caries of the petrous portion of the temporal bone. To this form of attack those persons are especially liable who have been subject, at different times, to purulent discharges from the ear. Therefore, when such persons are afflicted with deep-seated ear-ache, of longer duration and greater severity than usual, there is always room for alarm, and need of watching and attention. Sometimes discharge from the ear takes place from time to time, during the continuance of the complaint. At other times, the attack supervenes upon the sudden cessation of the purulent discharge. The symptoms which indicate an extension of inflammation from the external passage, and from the bone to the internal lining of the cranium, are drowsiness, slight delirium, shiverings, and, finally, coma. The drowsiness is like the state which usually accompanies erysipelas; indeed it is not uncommon for these cases to be combined with erysipelas. As I have known this to occur in two or three instances, it cannot be an unusual combination. It is surprising how sudden the invasion of coma is, sometimes, in these cases, and with what rapidity it proves fatal. An elderly lady had been suffering for some time from the symptoms of irregular and wandering gout; she had complained also of pain in her ear, attended with a slight discharge of matter. The discharge, however, had soon ceased, and the constitutional symptoms became alleviated. On the second day of my visiting her, she considered herself perfectly well, with the exception of a slight head-ache; but she was found in a state of coma on the following morning, and died in the course of a few hours. I was unable to obtain leave to examine the head; but the liability of gouty subjects to inflammation of the membranes of the brain, together with the preceding pain and discharge from the ear, left no doubt on my mind of the existence of inflammation, and probably of suppuration, within the cranium; and I have since found that Dr. Abercrombie relates a case remarkably similar to this, respecting which he came to the same conclusion. Dr.

Powell has recorded the case of a young man, who died under an attack of intense pain entirely confined to the ear, and attended with a purulent discharge. The petrous portion of the temporal bone was found to be carious, and over it, for the space of about half an inch in diameter, the dura mater was black and sloughy, and separated from the bone. The rest of the dura mater was healthy in structure, but under it an extensive layer of coagulable lymph and pus covered the whole of the superior surface of one hemisphere of the brain, and the posterior lobe of the cerebrum, and the tentorium. "The vessels of the substance of the brain were not more numerous or loaded than usual, and the brain itself was healthy in every part."—(Med. Tr. vol. v. p. 210.)

Young persons of a delicate or strumous habit are particularly liable to this form of disease, and it appears to begin in the ceruminous glands, extending itself to the bone, and thence to the dura mater. In Dr. Powell's case were exactly exemplified the appearances both of the bone and membrane, which are usually met with on dissection. In some cases there is a superficial abscess of the brain itself or of the cerebellum, and occasionally, the bone being perforated by disease, the matter of an internal abscess finds a free vent by the ear. It has been thought that a cure has in this way been effected; but in the cases of supposed recovery, it is not quite certain that the matter discharged did really come from the cavity of the cranium.

The cases in which matter has been deposited, or an abscess formed, in the *Lateral Sinus*, are instances, probably, of inflammation of the dura mater, excited by disease of the bone.

Dr. Hooper has, however, given a representation of a case (Pl. v. fig. 4) in which there was an abscess in each lateral sinus; and he adds that on the left side "the pressure of the abscess on that part of the temporal bone which it covered, namely, the groove for the lateral sinus, just above the foramen lacerum in basi cranii, caused a complete absorption of it; a tumor pointed externally, and pus was evacuated through the meatus auditorius externus. The abscess in the right lateral sinus had ulcerated the side, so as to cause a very small portion of the corresponding bone to become carious."

Dr. Hooper, therefore, considers the disease in the sinus to have been *prior* to that in the bone. And since in this case both sinuses were diseased, and the bone carious only to a small extent, this view of the pathology of the case may probably be correct. But as in other cases the disease is confined to one lateral sinus, and is found in connexion with extensive caries of the bone, and as the liability to attacks of pain and suppuration in the ear has in these cases preceded the apparent occurrence of internal disease, even for several years, it would seem that the affection of the lateral sinus is generally the consequence, and not the cause, of disease in the bone and in the textures external to it.

On the whole it should be recollected that inflammation of the dura mater, arising from disease in the ear, is generally as insidious in its attacks as it is dangerous in its consequences.

Disease of the ethmoid bone, attended with discharge from the nose, and, indeed, disease of any part of the cranium, is capable of producing inflammation of the dura mater. And the symptoms and consequences which ensue are similar to those which have already been described. Many such cases are to be found recorded in the works of Morgagni, Bonetus, Lientaud, and others.

When the dura mater is affected with *Chronic Inflammation*, alterations in its structure are effected slowly and gradually, and the symptoms are necessarily of an obscure and indefinite character. The most common alteration to which it is liable is thickening, in consequence of the deposition of matter between its laminæ. Dr. Baillie has given a representation of a case of thickening of this kind, which had proceeded to a very great extent.—(Pl. v. fig. 1.)

The symptoms which have been observed in cases of this nature are, giddiness, a very remarkable prostration of strength, or loss of muscular power, which sometimes precedes the occurrence of other symptoms, and continues without any evident cause, until it is succeeded by head-ache, convulsions, coma, and death.

Nearly the same symptoms attend the formation of tubercles on the dura mater, the consideration of which will be deferred till we come to speak of the various morbid growths which are met

with within the cranium. Of the treatment of inflammation of the dura mater, it is unnecessary to speak apart from the consideration of that of inflammation of the other membranes. The first disorder must soon give rise to the second, nor does it previously require a separate mode of treatment.

In the next lecture we shall proceed to that important part of our subject, inflammation of the arachnoid and pia mater.

[To be continued.]

ABSTRACT OF A CLINICAL LECTURE

ON

UNION AND ON OMENTAL HERNIA,

Delivered at Guy's Hospital, June 17th,

BY C. A. KEY, Esq.

I WAS about to make some observations on the subject of bunion, had the time allowed me, at our last meeting. Although a subject of minor importance, and one that hospital practice rarely presents to our notice, yet, in private practice, we are frequently consulted respecting it, from the great deformity and inconvenience it occasionally produces. I was led to notice the subject from observing it on the foot of Grant, now in the hospital for fracture of the thigh.

The popular opinion respecting bunion is, that it is analogous to a corn, and its origin is referred to the pressure of the shoe. The medical idea entertained respecting it is, that it is analogous to the bursal tumor on the patella, and that it takes its origin from the same cause—namely, pressure. The true nature of the tumor, and its cause, I will endeavour to explain to you.

You are aware that the usual seat of the tumor which has received the name of bunion, is the inner side of the metatarsal articulation of the great toe. Its size is sometimes so great as to interfere with the person wearing a shoe, and the pain is sometimes so excessive, even when freed from pressure, that the person is compelled to confine himself to a sofa. Removing the pressure of the shoe, or diminishing its force by the application of successive layers of plaster, in the manner commonly recommended for corns, together with rest, rarely fail to give temporary relief. Soon a fresh attack of pain comes on, and yields to the same plan of treat-

ment, without, however, any progress being made towards the removal of the evil.

In the examination of the structure, you will find that it is not merely a bursal tumor, though the latter structure forms a large portion of its bulk. In this specimen, which I have dissected in order to shew you, you will see the changes which the several parts have undergone. The first thing observable when the integuments are divided, is a ganglion of more or less capacity, situated between the lateral ligament of the joint and the skin, formed by the pressure which the part has undergone, in conformity with the usual law of bursal formation. The change which the lateral ligament has undergone is more singular: instead of its usual fibrous appearance, it has become a compact laminated structure, the laminae becoming dense towards the bone, and more separated towards the skin, as if bursæ were successively forming in the texture of the lateral ligament, as fast as the outer one might happen to be obliterated by inflammation. The mischief is not confined to the soft parts; the head of the metatarsal bone has become changed; the cartilage no longer preserves its polished appearance, but is covered with numerous warty projections, or granulations, the result of continued irritation upon the synovial surface of the cartilage. Such, it is probable, is the change, in a greater or less degree, which bunion produces whenever it is formed upon this joint; and when so formed, it is almost needless to say it must be exceedingly difficult, in most cases impossible, to restore the part to its natural healthy condition. We may here bear in mind the adage, "that prevention is more easy than cure." Let us then refer to its cause.

You will first notice the form of the foot, and particularly of the great toe, in this cast taken from the man in question. The phalanges of the toe are not in a line with the metatarsal bone; the former are seen projecting outward, forming at their metatarsal articulation an angle more or less obtuse with the head of the metatarsal bone. This deviation from the natural form is owing partly to the shoe pressing the great toe outward, but principally to an oblique bearing upon the inner part of the foot, which throws an undue degree

of weight upon the inner lateral ligament of the great toe, and thus compels the ligament to yield to the increase of pressure: the great toe is thus forced outward, while the head of the metatarsal bone is forced inward. Persons who are subject to bunions, are usually females, whose tarsal ligaments are weak, and who therefore have not a direct bearing upon the sole of the foot; when they walk, you may observe the whole tarsus inclined inwards, while the phalanges of the toes, more especially of the great toe, are thrown in the opposite direction. From the same cause, the plantar arch is not well preserved, the sole becoming flat, and the inner part nearly coming in contact with the ground. Even in this man's foot, the oblique direction of the great toe, and the incomplete arch of the foot, may be observed; in him, however, the bunion has not become a source of much inconvenience. In young females who have a tendency to them, so lax is the lateral ligament of the great toe that it may be turned outwards so as to form nearly an angle of 115° or 120° with the metatarsal bone. This yielding of the ligament should be early watched and prevented; it is the first step towards this very troublesome complaint, and I believe will be found to have its origin very early in life. The subsequent change which the ligament undergoes is readily understood; its function as a ligament ceasing, it becomes serviceable by assuming the character of condensed cellular membrane, and forming a series of bursal cavities, by which it alleviates the effects of that oblique bearing of the bones which it is no longer able to prevent. The means that we should employ in the early tendency to bunion, when the tumor is painful, though the distortion may be inconsiderable, consists in diminishing the weight of pressure by which the joint becomes distorted. When the ligaments are naturally weak, even shoes made narrow at the extremity will, by their pressure, tend to give an improper direction to the toe, and lay the foundation of the inconvenience, which will be aggravated into a disease by the direct pressure of the shoe on the projecting joint. The person should be enjoined to avoid all kinds of exercise likely to strain the tarsal ligaments beyond their strength. Dancing throws the foot (when the joints are weak) into a position very unfavourable for the inner ligaments of the

tarsus and great toe, and increases the tendency to bunion, when any exists. Horse exercise strengthens the articulations of the bones of the foot, and should be substituted for walking, when the bearing upon the sole of the foot is oblique, from an inclination of the tarsus to yield. Some assistance may be derived from mechanical contrivance, both in the prevention and cure: increasing the thickness of the sole of the shoe may be of service, by throwing the bearing of the foot on the outer side, and taking off the weight of the body from the inner part of the arch. But the joint of the great toe requires especially our attention; its obliquity may be very much corrected by fixing a small splint (made of iron, and covered with wash leather), with a joint, along the inner side of the toe, extending from the base of the metatarsal bone to nearly the extremity of the toe: it may be secured either with a small strap and buckle, or with straps of adhesive plaister to the metatarsus and to the last phalanx. I am now employing a contrivance of this kind in a young lady who has suffered much from this troublesome affection of the feet.

Mr. Key then proceeded to make some observations on omental hernia, prefacing them by the following case:—

Anne London, æt. 35, a widow, had for 10 years suffered from a femoral rupture, which had never given her any uneasiness until about a month ago, when by a sudden exertion it descended, and could not be returned. The absence of symptoms, and its feel, characterized it as omental, and she was requested by Mr. Key, to whom she applied, to go into the hospital for the purpose of having it reduced. She was admitted June 3d. The tumor is rather less than an egg, and has the peculiar doughy feel of omentum, giving her slight pain even when not handled. She is ordered to have ice applied continually to the swelling, and to keep her bowels regularly open by a mixture of epsom salts. The ice gives her relief, but produces slight pain in the chest.

June 15.—The tumor is reduced to a small nodule of omentum, which cannot be returned by the taxis, which Mr. K. employed to-day. This small remaining portion probably adheres to the sac, and therefore is rendered irreducible.

He then adverted to the importance of returning omental hernia; which, though often accompanied by no symptoms of severity, might lead to further mischief.

1st.—By preventing the proper application of a truss.

2d.—By allowing a portion of intestine to descend by the side of the omentum, the latter not entirely filling up the neck of the sac.

3dly.—By rendering the return of a piece of intestine difficult, the omentum protecting the gut, and preventing efficient pressure from being made upon it.

And, 4thly.—By entangling the intestine within its adhesions, causing strangulation, and thus endangering the patient's life.

The symptoms of incarcerated omental hernia differ from those of intestinal protrusion, the former being accompanied by more mild constitutional symptoms; the local pain being perhaps more acute in the omental than in the intestinal. The nausea frequently hardly amounts to vomiting, and the constipation, which arises only from sympathy, may be easily overcome by a brisk purgative; while, on the contrary, we frequently have the tumor very painful, the pain extending to that part of the abdomen in the neighbourhood of the rupture, or even to the region of the stomach; and the sac is sometimes so much distended with fluid as to delude the surgeon into a belief that he has intestine under his hand. Mr. K. thought a copious effusion to accompany more frequently omental than intestinal incarceration.

After entering into an explanation of the principle on which tobacco, ice, and purgatives (on the effects of which he principally relied in omental hernia) should be employed, he illustrated the subject by the three following cases that lately occurred in the practice of Mr. Toulmin, of Hackney.

A gentleman, who had been under Mr. Toulmin's care for bronchial affection, and annoyed by a continued cough, suddenly felt a protrusion at the right groin after a violent fit of coughing. Mr. Fred. Toulmin endeavoured by the usual means to return it, but not succeeding requested Mr. K. to see the patient with him. The tumor being evidently omental, and unaccompanied with constitutional symptoms, he was directed to maintain the horizontal pos-

ture, and to keep the tumor covered with a bladder containing ice. After continuing this plan for ten days, the tumor was readily reduced by gentle pressure.

The effect of inflaming the omentum by rough treatment was shewn in the instance of a lady who had been occasionally troubled with a hernia, but which had been always easily reduced. On the occasion of its last descent, instead of applying to a surgeon, she came to town to have a truss applied. After endeavouring, by violent efforts, to return the tumor, the truss-maker applied a strong truss, and sent her home. Her sufferings quickly induced her to send for Mr. F. Toulmin, who found the part exquisitely tender, but without constitutional symptoms. He applied ice, and freely purged her, but could make no impression on the swelling. Mr. K. who saw her with him, thought that the omentum had been inflamed by the pressure of the truss, and had contracted adhesions to the sac, which the taxis could not separate. It continues irreducible, though somewhat diminished in size.

Tobacco, a remedy much abused, and frequently falling into discredit because so abused, Mr. K. regards as one of the most valuable remedies in the reduction of strangulated hernia*. In delicate persons he prefers its exhibition by the mouth, in the form of smoke, or in the solid form, to the enema. A lady, single, about 50 years of age, troubled with a cough, felt, while in bed, a sudden protrusion in the site of femoral hernia. Mr. Toulmin, by the aid of the warm bath, reduced it. On the third day it again prolapsed, and refused to yield to the former measures. She was directed to smoke a pipe till syncope was nearly induced, but from the irritation of the smoke upon the larynx, she was compelled to discontinue it. An intelligent friend, who saw the necessity of obtaining the full effect of the remedy, said, "well, if you can't smoke, you must chew," and immediately gave her a "quid." This speedily produced so much collapse, as to enable Mr. Toulmin to return the hernia. This lady has been a third time the subject of strangulated omental hernia, for

* Mr. K. in his lectures, particularly insists on the necessity of adapting the dose to the age, constitution, and powers of the patient. In Guy's hospital, cases are frequently occurring in which the good effects of tobacco are strikingly shewn.

which the operation was performed by Mr. K. and has done well. The tobacco failed in the third descent to produce the usual depression of the pulse, although vomiting was excited by it.

The extent to which this species of hernia may exist, without such constitutional symptoms as to require the operation, is proved by the following case, which is interesting in other respects. The large quantity of fluid effused prevented the usual effects of cold upon the omentum: its return, therefore, became impossible; but the subsequent history of the case proved that the communication between the sac and the abdomen had been interrupted by adhesion of the omentum to the neck of the former.

J. P. æt. 28, admitted into accident ward for a large scrotal hernia, which had suddenly descended while he was engaged in unusually hard labour: he had been troubled with a rupture for several years, which he had contrived to support by a loose bandage. The tumor was large; the skin slightly discolored, and tender to the touch. Its size exceeded that of a large orange, and it had the pyramidal form of a large hydrocele, owing probably to the quantity of fluid effused. The abdomen around the tumor was slightly tender, but free from tension. He had no nausea, and his bowels readily answered to purgatives, which were administered soon after his admission into the hospital. Notwithstanding the free abstraction of blood, warm bath, &c. the taxis failed, and no better success attended the local application of leeches, and afterwards cold for several days. But the pain in the tumor abating, though its size remained undiminished, he left the hospital.

After a lapse of six weeks, he again applied, and was again admitted under Mr. Key, in consequence of the uneasiness he experienced in the swelling. It still retained its former size, the neck of the tumor feeling hard like omentum, the lower part being distended with fluid. As pressure could not force the water into the abdomen, a trochar was introduced, and several ounces of fluid were drawn off. The omentum could now be distinctly traced. The operation was followed by considerable inflammation of the sac, which subsided, and the fluid again collected. A second similar operation, at the end of ten days, produced a greater degree of

inflammation, which terminated in supuration of the sac. The constitutional fever ran high, but was subdued by calomel and opium, with the effervescent draught and hyoscyamus. The suppuration gradually diminished, and he left the hospital quite well, with but little swelling of the scrotum, except what a small portion of adherent omentum caused.

Mr. K. alluded in general terms to the danger of venturing upon an operation for omental hernia when the local symptoms were very severe. They arise more from the effects of inflammation than of strangulation, and do not yield to the operation. He was inclined to depend more upon local depletion and other antiphlogistic treatment in the case of very painful hernia, when the tumor could be distinctly made out to be a protrusion of the omentum alone: a hasty recourse to the operation, without due regard to the distinguishing marks between strangulation and inflammation, would generally prove unsuccessful. Mr. K. concluded by mentioning a case where he had witnessed an operation performed for omental hernia under the above circumstances, by which the inflammatory symptoms increased, and the patient quickly sunk.

ON THE IMPROPRIETY OF ERGOT IN PLACENTAL CASES.

BY SAMUEL JACKSON, M.D.*

THERE are five states of the uterus and placenta, any one of which may exist without any possibility of ascertaining the fact; and if it do exist, the ergot must prove a very serious, and often a deplorable injury. *First*, the hour-glass uterus; *Second*, the longitudinal contraction; *Third*, the morbidly, or otherwise too adherent placenta; *Fourth*, the depressed fundus; *Fifth*, a torpor of the uterus, or an insusceptibility of ergotism from long-continued labour, or other causes not understood. Under the two heads of hour-glass and longitudinal uterus, we here include all irregular contractions whatever, by which the placenta is retained, as they all fall under the same pathology and general indications of cure, whether the coarcta-

* American Journal of Medical Sciences, Feb. 1829.

tion pervade the whole volume of circular muscle, or be confined to a band of uncertain width, and whether this last be situated in the neck or the body.

Of the hour-glass and longitudinal uterus, it might be supposed they could be ascertained partly through the medium of the abdominal parietes, and partly by the common examination per vaginam with the mere finger. Thus it may be said that when the uterus reaches high up in the abdomen, and is contracted laterally, when there is no hæmorrhage, and the placenta cannot be reached by the finger, these irregular contractions are to be suspected. But every one must know that these circumstances do all very frequently obtain, when the contraction is at least sufficiently regular to expel the placenta without help, and therefore that any examination of this kind may often deceive. It may sometimes succeed in strongly marked cases, when the abdominal parietes are thin, and the accoucheur endowed with the *tactus eruditissimus*; but as a standing rule, and in ordinary hands, we hold that these contractions cannot be ascertained short of introducing the hand.

The uterus is sometimes found large, hard, and globular, and the unnatural stricture is so formed that the upper cyst lies buried among the intestines under the great mass of the womb, and though small, it may contain the greater part of a small placenta. This we have known in two instances. The womb felt imperfectly but regularly and firmly contracted when examined above the pubes.

When the uterus is felt to be well contracted, there may be a stricture near, or at the neck, which grasps the placenta, and prevents its expulsion. This mass is perceived by the finger, is felt to protrude a little with every pain, and hopes are entertained that it will be quickly delivered; but when the accoucheur has waited till all are out of patience with such unexpected delays, he introduces his hand, and finds a stricture near the cervix uteri, and the prolonged placenta still adhering. Denman says that when the placenta is detached and fallen into the vagina, it may be left there to be expelled by the after-pains. But it is very certain that when it has all the proofs possible of being detached, and even protrudes a little extra vaginam, it may yet be held fast by a

contraction of the cervix uteri, and the entire separation be thereby prevented. This we have known, both in our own practice, and that of the midwives; it is also mentioned by Dr. Dewees, and particularly treated of in his *System of Midwifery*.

In the longitudinal contraction, the uterus is felt through the abdominal parietes to be firm, globular, and well contracted; the placenta is felt by the finger, and appears to be descending with every pain; but when at last the hand is introduced, this mass is found to be embraced by a long horn-like process, which grasps a portion of it, and prevents its entire separation.

The kind of contraction which is present, cannot therefore be ascertained by any means that we know of, and if ergot is given, it must be at the risk of doing evil, rather than with the certainty of doing good. It is very true that in many cases nothing could possibly be more appropriate, but to ascertain that if such be the case in hand, we hold to be altogether impracticable. Thus, a few nights ago we presumed that the uterus was most irregularly contracted; it felt as though there was a long process passing off in the direction of the spleen, and the placenta could not be reached with the finger, though the pains were frequent and pressing. On proceeding to the manual extraction, the uterine cavity felt regular, and the hand with the placenta was very gently expelled by a single pain. But on the contrary, we shall relate a case of hour-glass uterus in which there was every reason to believe the contraction to be regular, and therefore we tried the ergot once more in compliance with the best authorities, though altogether in contempt of our own principles.

Mrs. G. of G. was delivered of her first child about two months ago, after a tedious and painful but natural labour. She was very young, weak, and excessively irritable from the first, for which reason we did not proceed to the manual extraction as soon as we should have otherwise done. The womb was felt large, globular, hard, above the pubes, and the placenta, *as was supposed*, was reached by the finger. The natural pains did not supervene within one hour, though frictions had been frequently used, and therefore we gave thirty grains of ergot, in divided doses. Here we could not believe there was an irregular

contraction, for the uterus was so large and globular, it appeared hardly possible that a portion of it could any where exist sufficient to form a separate cyst; it could not be at the fundus or body, which were felt so very distinctly, nor at the neck, for something was felt by the tip of the finger, which was, as we supposed, the whole mass of the placenta.

The ergot brought on its peculiar depressing pains, but they gradually diminished after an hour, without having in the least protruded what was supposed to be the placenta, or having changed the shape of the womb, as felt above the pubes. The abdomen now began to swell, and though the woman was so irritable, from the first, as hardly to suffer us to touch her, we determined to wait no longer. The supposed placenta was discovered, on introducing the hand, to be a quantity of blood collected in the membranes, and it was found that the real placenta, which afterwards proved to be unusually diminutive, was enclosed in a very small upper chamber, that seemed to reach almost under the sternum, and the contraction was so close that it tightly embraced the cord. Here was a deplorable business for a delicate and excessively irritable young lady, but there was only this method of proceeding, however painful. She passed at least fifteen minutes of most cruel suffering before she was relieved. Contrary to our expectations, she had a speedy recovery, and without any other backset than two or three fits of an habitual intermittent. How much better would it have been to have tenaciously adhered to the principles laid down in our former paper, and thus to have removed the placenta at the end of an hour, sooner or later! It is true, there might have been at that time, and no doubt there actually was, an hour-glass uterus; but it may be fairly presumed that the contraction was not so violent, and it is fully certain that all the parts were in a more fit state for the manual extraction, and the patient's mind far better prepared to suffer.

In cases of the morbidly adherent placenta, it is probable that some of the organ might be cast off by the powers of the ergot, and if the greater part should fortunately come away, and the practitioner be content with this state of things, there is hardly a doubt but that the rest might be separated by the ope-

rations of nature. This we conceive would prove more fortunate than the detachment by manual violence. See Smellie, Vol. II. Collect. xxiii. Case 2. But should the whole placenta remain, or the greater part of it, the patient would have to suffer all the torment inflicted by the ergot, and also to undergo the manual extraction, now rendered ten-fold worse by delay and irritation.

When the fundus is depressed, and the womb in danger of inversion, of which the attendant can know nothing till the hand is introduced, the mischievous operation of the ergot is painful, even in contemplation. But it will be said, that the careful practitioner will always ascertain this by an examination above the pubes. This is not absolutely certain in the mere depression, however possible it may be to do so in the complete, and even in the partial inversion. But even here, Denman says that in one case, (that is of inversion), that was under the care of a person who might have been allowed to be a competent judge, and expected to act more wisely, when he applied his hand to the abdomen, the recession of the inverting uterus was mistaken for its contraction, and it was actually inverted, though he entertained no suspicion of what had happened. If this could happen in the hands of such a person as Denman speaks of, and that too in case of *inversion*, surely the mere *depression* might never be detected by half the practitioners, male and female, of the obstetric art.

But it may be said that this state of the uterus must always be within reach of the finger; certainly not always, though in deep depressions it no doubt may. Dr. Dewees, System of Midwifery, 3d edition, p. 486, says, "I found the placenta *just within reach of the finger*, and attempted to withdraw it, but it gave great resistance and extreme pain. I now *introduced my hand*, and found a tumor resembling in shape and size the swelling at the bottom of a common black bottle, over which the placenta was spread." And again, p. 490, he says of another case, "I took hold of the cord and merely tightened it, on which she begged me to wait, as it gave her great pain. I traced the end to the vagina, and found at the os externum a placenta I thought unusually dense and large. On gently attempting to withdraw it, as I thought it

loose in the vagina, I found uncommon resistance, which I attributed to its bulk, and desisted from further effort, hoping the uterus would, by contracting, push it completely down. In this I was disappointed. I now expected that a more than common cause detained the placenta in the vagina, and began a more complete examination. I pierced the substance of the placenta with my forefinger, and tightened the cord; beneath the placenta I perceived a round, hard substance, which I but too quickly discovered to be the fundus of the uterus inverted."

The above cases show most clearly that the depressed fundus may exist without being ascertained by a common examination above the pubes and per vaginam with the finger only. To expatiate on the action of ergot in such cases is wholly unnecessary.

In our fifth and last state, we supposed the uterus to be insensible, or nearly so, to the operation of ergot. It happens that we never gave a dose of this medicine for the expulsion of the child that did not bring on strong pains; but in placental cases we have often been disappointed, though the medicine was taken from the same parcel. It has sometimes failed entirely to excite the uterus, and not unfrequently it has superinduced some grinding pains that very soon died away.

There is another point of view in which ergot may not be considered entirely safe in placental cases, even when all the parts are in the most favorable state for its just operation. It may excite pains out of all proportion to the object to be attained, and which may not very soon subside. When we give this medicine for the expulsion of the child, its power may be in a great measure exhausted by the time the labour is finished; not so when given to expel the placenta, as this process is often quickly finished, and in such cases the ergot may expend itself in furious spasms or throes which may not be easily subdued, and may even end with a prolapsus, if not a proeidentia uteri. We have never seen any thing similar, but Dr. Dewees, *System of Midwifery*, third edition, p. 620, and also in Vol. I. of this Journal, p. 258, relates a case precisely to the purpose. "A lady aborted at a little beyond the fifth month with twins. The involucre did not come away for several days after

the expulsion of the embryos; but as they came off in *one mass* very soon after taking twenty grains of ergot, the lady could not be persuaded but that one of the placentæ remained, and desired that another dose of the ergot might be given her. This I positively refused, but at the same time assured her that nothing remained to come away. She was, however, not convinced; for I had scarcely left the house before she caused another portion of the ergot to be given her. The consequences were a repetition of violent pains, and the escape of a considerable portion of the uterus through the os externum." In the next page the doctor says, "I am therefore convinced that much future injury has been sustained by giving this medicine in cases where there is little or no resistance to be overcome; for in such cases the increased efforts of the uterus continue after the child is delivered." This reasoning, we presume, does not reach those cases in which the ergot ought to be given in very small doses merely to produce a tonic effect.

Now, when we take into consideration the various circumstances in which ergot cannot be used with propriety, any one of which may exist without the knowledge of the practitioner giving this medicine, and add to these the cases in which it will merely distress the patient with its peculiar grinding pains, and fail at last to effect its object without any assignable reason, we are ready to conclude that it is by no means applicable to the expulsion of the placenta. The only reason to be assigned for the use of ergot is, that it may supersede the painful expedient of manual extraction. But here we must not forget that ergot itself is a painful expedient. The throes or spasms which it brings on are not natural, and are indeed hardly similar to labour. The woman always knows the difference, and expresses her impatience with them. This difference obtains more clearly in placental than in child-birth cases. Now suppose that an accoucheur has fifty cases a year of the placenta retained too long, and that he gives ergot in every one—the totality of suffering will be very great, and far greater than if he were to proceed to the manual extraction at a proper time; as the medicine must in some cases fail, most generally distress the patient even when it suc-

ceeds the best, will sometimes add strength to the irregular contractions, and will at all times occasion an anxious delay.

Nor is the influence of one example to be neglected in these cases. It seems to be the part of the midwives to abuse all the learning they casually acquire from the regular accoucheur, and most certainly they will not fail to provide themselves with a medicine apparently so very convenient. Whereas it is their business to send for further help in all cases of retained placenta.

After all that has been said, it must be confessed that the necessity of using either ergot or the manual extraction bears but a very small proportion to the totality of cases, and that a still smaller proportion of these will be subject to the various casualties which oppose the use of ergot; consequently an accoucheur may pass through a long and busy practice without encountering any of the evils, or doing any of the mischief we have here set forth. Hence, if the experience of others is in favour of giving ergot in these cases, it must surely be considered as owing to a more fortunate succession of suitable cases; the very next that occurs may disappoint their hopes, and change their opinions, may bring themselves and their patient into all the distress of an hour-glass uterus rendered tenfold worse by the action of ergot, and teach them the necessity of acting by known principles in pathology, rather than by the dictates of unprincipled experience.

Northumberland, Pa. Dec. 1828.

MELÆNA.

To the Editor of the London Medical Gazette.

York, June 20, 1829.

SIR,

THE subjoined case of melæna appears to me sufficiently interesting to warrant insertion in your Journal. Should you be of the same opinion, I shall feel obliged by its being recorded.

Your obedient servant,
H. S. BELCOMBE, M.D.

June 1st, 1828.—Mr. H. this day requested my advice. He states himself to be in his 57th year; to have long

laboured under dyspepsia, for which a few simple remedies have from time to time been taken, but that he has never undergone any regular course of medicine, nor remitted his accustomed duties. For many years he has devoted the greater part of the day to business, and his spare time has been chiefly devoted to literary pursuits. The death of a very intimate friend, a short time ago, gave him a severe shock, and first made him think a little more seriously of his state of health. He complains of fulness of the stomach, an unpleasant sense of fluttering about the chest, vitiated taste, fulness and viscidness of the fauces, constant nausea, and torpid bowels. The tongue is very pale, and streaked with yellow. Pulse 80, languid. Evacuations pitchy black; urine pale; countenance anxious, of a dirty yellow colour; abdomen distended, soft; and pressure creating no pain in any part. An emetic brought away an immense quantity of sordes and undigested food. He was so much relieved by it that another was given on the succeeding day with the same effect, but followed by considerable hæmatemesis, the blood being exceedingly dark. The bowels were well emptied; the evacuations as before pitchy black. He now complained of occasional vertigo, general restlessness, anxiety, and frequent fainting fits: he had one during my visit, which alarmed us all much: he soon recovered, and after taking a little food declared himself much relieved, and feeling very comfortable.

In consultation with Dr. Goldie, it was determined to give small doses of blue pill and opium morning and evening. The nitric acid in infus. ros. ter die, and to try to support him by a moderately generous diet. Under this plan, from the 3d up to the 8th, he appeared to improve so much that all his family had sanguine hopes of his recovery, and our longer attendance was thought unnecessary; though both Dr. G. and myself, well aware of the deceitful nature of the disease, and of the danger that lurked under all this semblance of returning health, felt justified in giving a very cautious prognosis, and in endeavouring to moderate the feelings of the family. On the 13th I was again summoned to him hastily, in consequence of a return of all his symptoms, supposed to have been brought on by over exertion, and a little excess in

food. I found him very ill. Tongue brown and dry; pulse quick, feeble, and fluttering; syncope upon the least exertion; much blood, dark and grumous, passing down. Some stimulants were exhibited with temporary benefit; but at 9 P.M. we were again urgently sent for, and arrived just as he had expired.

Inspection of the body was declined.

ANALYSES & NOTICES OF BOOKS.

“L'Auteur se tue à alonger ce que le lecteur se tue à abrégér.”—D'ALEMBERT.

Symptoms of Pregnancy and the Diseases resembling it.

(Being a continuation of the Analysis of Dr. GOOCH's Work on the Diseases of Women.)

IN a former Number we gave an analysis of Dr. Gooch's observations on diseases of the mind in lying-in women. This part of the work is followed by “thoughts on insanity, as an object of moral science;” but as these “thoughts” are necessarily of a more abstruse or metaphysical character than the topics we usually discuss, and such as admit not of condensation without the risk of perverting the author's meaning, we must content ourselves with referring our readers to the volume itself, while we confine ourselves to the more practical questions.

The object of the third chapter is to give a full and connected account of the symptoms of pregnancy, and the methods of distinguishing these from others which resemble them. The omission of menstruation, the morning sickness during the first half of pregnancy, the progressive enlargement of the abdomen after the first three months, the increased size of the mammæ and darkness of the areola, as well as, last and most conclusive, the movements of the child, are known to all: but as these symptoms may be absent in those who *are* pregnant, and present in those who *are not*, inferences drawn from them are frequently erroneous.

Many women have a periodical discharge during the early months of pregnancy, which they cannot distinguish from menstruation. Nothing can be more variable than the sickness. The enlargement of the breast is often but slight in thin women, while in fat women the mamma bears so small a proportion

to the bosom that its increased size is scarcely perceptible. In those who are fair, the darkening of the areola is very slight, and in brunettes the part remains permanently dark after the first child; the enlargement of the abdomen will cease to be progressive if the fœtus dies, and even with regard to its movements there are some instances in which these have not been perceived, though the child has been born alive, and of course they are absent when it is dead.

“Thus (says Dr. Gooch) a woman may be pregnant though she seems to herself to continue to menstruate, has no sickness, or enlargement about the breasts, or darkness of the areola, or progressive enlargement of the abdomen, or perceptible movement of the fœtus. Such a complete assemblage of omissions, however, is not likely to meet in the same case.”

On the other hand, a woman may have all the symptoms of pregnancy and yet not be so; as the several phenomena above enumerated may occur from other causes. The symptoms, however, to which we have alluded, are sufficient, in all ordinary cases, to decide the question; and in those which are *extraordinary*, it is necessary to wait till we can determine these two points—“first, whether the enlargement of the abdomen depends on enlargement of the uterus; and if so, secondly, whether the enlarged uterus contains a fœtus.” These can obviously be determined by the touch alone, and the longer this is delayed the more is the result to be depended upon. Dr. Hunter says, in his MS. lectures, “I find I cannot determine at four months, I am afraid of myself at five months, but when six or seven months are over I urge an examination.”

The uterus may be examined either through the parietes of the abdomen, or per vaginam. With a view to the former, the patient ought to be in bed, on the back, in a posture between sitting and lying.

“The first thing to notice is the situation, consistence, and figure of the tumor which is distending the abdomen. In pregnancy the uterus does not rise out of the pelvis before the third month—by the sixth it is up to the umbilicus—by the seventh it is a little above the umbilicus—by the eighth month it is half-way between the umbi-

licus and scrobiculus cordis—and in the ninth month it has reached the scrobiculus cordis, its highest elevation: thus, if we are examining a patient about the sixth month of pregnancy, we shall feel a circumscribed tumor occupying the front of the abdomen, from the brim of the pelvis to the umbilicus, of an oval form and firm consistency, much firmer than the abdomen above and on its sides, where it is occupied by the intestines. All this can be made out clearly if the walls of the abdomen are thin and relaxed; if they are fat, this is difficult, and often impossible; but even then we can notice whether the enlargement is firm or soft; the former will be the case if the patient is pregnant.

“The next thing to notice is the umbilicus. In the unimpregnated state it is sunk below the surface, forming a shallow pit; but in pregnancy, when the uterus has risen to or above the umbilicus, this part projects above the surface of the abdomen; this, however, depends on the period of pregnancy at which we are examining: it will scarcely be found before the sixth month, and the further the pregnancy is advanced, the more distinct will it be. The firmness of the abdomen and the projection of the umbilicus depend on one and the same cause, that is, the firmness of the tumor which is distending the abdomen; but any other tumor equally firm may occasion both these symptoms: their presence alone proves little, but if the state which we are investigating is advanced as far as the seventh or eighth month, their absence proves a great deal, for if the umbilicus is depressed, and the abdomen, though enlarged, is soft and yielding, these alone prove that the patient is not pregnant. Let not the practitioner, however, give an opinion till he has collected all the proofs.

“The next thing to attend to is, the movement of the child. If the hand is laid on the naked abdomen, between the pubes and the umbilicus, the foetus will sometimes be felt to stir. As, however, it moves only occasionally, this may not happen during the examination. It is said, that by dipping the hand in cold water, and laying it suddenly on the naked abdomen, the foetus may be made to move. As I have long had the cold hand of a dyspeptic sufferer, I have no occasion to dip my

hand in cold water; it is always cold enough to make the patient shrink, and by laying it suddenly on the naked abdomen, I have sometimes felt the child move, but this has been only an occasional occurrence. If distinctly felt, it is of course the most conclusive symptom.”

In making an examination per vaginam, the patient is to be placed on her side in the usual manner. The first thing to be observed is the state of the neck of the uterus: this, in the unimpregnated state, projects into the vagina about two-thirds of an inch, while, at the termination of utero-gestation, it is obliterated so as to form a flat roof. It is generally stated that the neck of the uterus remains unchanged till after the fifth month; but, according to our author, these assertions are to be received with some limitation, as he has known the part as much changed in some women at the fourth month as in others at the sixth.

The second point relates to the body of the uterus—namely, whether it be enlarged. To determine this, the finger is to be pressed between the neck of the uterus and the pubes: in the unimpregnated state, there is here nothing but what is soft and yielding, but during pregnancy (if advanced some months) there is a large firm tumor. This is readily detected by a practitioner of experience, but the beginner has more difficulty in satisfying himself about this than the other signs.

A third circumstance affording a diagnostic sign is this:—the foetus floats in the liquor amnii, and when the mother is in the upright position, its head rests over the top of the vagina. Now, if the examiner applies his finger to the uterus just in front of the neck, and gives it a push, the foetus will recede for an instant, and then fall with a perceptible weight on the point of the finger. “This sensation (says our author), if once felt, can never be mistaken.”

After having described the different modes of examination, the author goes on to consider the class of cases in which practitioners are liable to be consulted.

1. Single women sometimes are pregnant, and yet obstinately deny the fact; and married women, especially after having passed several years without children, are apt to attribute their

increased size to some other cause. Of both these, some curious and instructive instances are given.

2. The next class of cases mentioned consists of a torpid state of the uterus, with flatulence of the bowels. This is most common in rather advanced life (about 50), the menstruation ceasing, and the parietes of the abdomen often getting fat about this period. Of this class of cases, also, various examples are given, and among the rest, that of the celebrated Joanna Southcott is particularly noticed.

3. Tumors of the ovary may be mistaken for pregnancy; but this can scarcely happen except when the duration of the tumor has been under nine months, and where it is too solid to fluctuate. In this case, an examination *per vaginam* settles the question. But a woman may become pregnant having an enlarged ovary, and Dr. Gooch has known several cases in which this has happened, and the two tumors have gone on enlarging together.

4. In the cases above mentioned, the cause which distends the abdomen is external to the uterus, and therefore, when we have ascertained that this is not enlarged, we have determined the question of pregnancy in the negative; but sometimes the womb itself may be increased in size, and yet not be impregnated. Air, water, and hydatids, have been mentioned by practical authors as capable of producing this phenomenon. In these cases it can be ascertained that the uterus is distended with something, but what that is must be more or less matter of conjecture. The absence of the characteristic signs of pregnancy will generally decide what it does *not* contain.

Polypus of the Uterus

Forms the subject of the fourth chapter. The disease is for the most part long mistaken for profuse menstruation, till at length an examination is made, and the true nature of the malady readily discovered. When this is done, it is ascertained to be a tumor in the vagina attached to the uterus: it is round, firm, and smooth, having a narrower part, or stalk. This may be fixed to the womb at the fundus, neck, or orifice: if to the fundus, the stalk is completely encircled by the neck of the uterus, and if the finger can be introduced far enough, it readily

passes completely round the polypus: if, again, it be attached to the neck, the finger cannot be passed quite round the stalk, but is arrested at that point where it is so attached: if the polypus grows from the edge of the orifice, "it feels as if a portion of the lip was first prolonged into the stalk, and then enlarged into the body of the polypus." These polypi vary very much in size; the author has removed several as large as the head of a new-born child, though they are generally much less than this. In some instances he has known frequent hæmorrhagies produced by polypi not exceeding the size of a filbert.

In the history of the disease the most important point is the diagnosis, as tumors often form in the vagina which resemble polypus, but which are different in their nature, and require very different treatment.

"The tumors which are likely to be mistaken for polypus are—1. the prolapsed uterus; 2. the inverted uterus; 3. malignant excrescences from the uterus.

"It is not likely that any man of moderate knowledge and experience should mistake prolapsus for a polypus of the uterus. In prolapsus, the tumor has at its most depending part a palpable orifice, that of the uterus, into which a probe or bougie can be passed several inches; the tumor is sensible, so that if pricked or scratched the patient feels it; the tumor grows broader the higher the finger is passed, and it cannot pass high, for it is soon stopped by the angle where the vagina is attached round to the uterus. The higher the tumor is pushed, the easier does the patient become. In all these particulars the polypus is just the opposite; it has no orifice, it is insensible, so that if pricked or scratched the patient does not feel it; the finger can be passed very high, and the higher it is passed the narrower becomes the tumor; the higher the tumor is pushed, the more uneasy becomes the patient. I have seen many cases of this kind which gave occasion to doubts, but never one in which it became a question whether the tumor was prolapsus or polypus of the uterus.

"Inverted uterus being a rarer occurrence, is less likely to be met with; but when it is, it is more likely to be mistaken for polypus. When the uterus is only partially inverted, that is, when

its fundus only is drawn down through its orifice into the vagina, and the patient has survived for many months, the tumor feels exactly like a polypus of the fundus. The distinguishing marks are, the time of its first appearance, which must have been immediately after delivery, and its sensibility. In the smoothness of its surface, the roundness of its body, the narrowness of its neck, and its being completely encircled by the orifice of the uterus, it sometimes exactly resembles polypus of the fundus, of which the following case affords an example:—

“The first time I saw the patient was in consultation with Dr. Clarke and Dr. Henry Davies; she had been delivered some months before at St. Omer, and immediately after the removal of the placenta, which had been extracted with some violence, a tumor had been felt projecting from the uterus into the vagina, since which she had not only had no hæmorrhages, but had not even ordinary menstruation. When we examined the tumor, we found it about the size of a small apple, with a smooth surface, a somewhat narrow stalk, which was completely encircled by the orifice of the uterus, exactly like a polypus, but its quick sensibility to touch, and the circumstances under which it made its first appearance, inclined us to believe that it was an inverted uterus, and not to recommend its removal, particularly as she was losing no blood, and her health was sustaining no injury from it. She returned to the continent, and I did not see her again for two years, when she again came to London, to place herself under the care of Dr. Granville, who had recommended her to submit to an attempt to revert it, and I now saw her in consultation with the Doctor. Since my former interview with her, she had become subject to frequent and profuse hæmorrhages, which had bleached her face and broken her health, and it now became an urgent object to afford her relief even at some risk. We agreed, therefore, that the attempt should be made to revert the tumor, but if this failed, which appeared most likely, we proposed to her husband the removal of the tumor by the ligature, stating to him that such an operation had been done successfully, but that it was attended with considerable risk. This both he and the patient were willing to incur. The

attempt at reduction failed; but before applying the ligature, her former attendants, Dr. Clarke and Dr. Henry Davies, were consulted, and all of us agreeing to recommend the operation, the ligature was applied by Dr. Clarke; it was tightened every other day, and each time occasioned so much pain as to require a large opiate to quiet it; at length, on the fourteenth day, both instrument and tumor came away. There were times when I had a strong suspicion that it was a polypus, but a sight of the tumor proved that it was the fundus of the uterus, for it was a hollow cup, the size of a small apple, in the cavity of which could be seen the fallopian tubes. Excepting the pain and some vomiting, the patient had no bad symptoms during the progress of the cure; and several months afterwards her husband called on me to say she was quite well.

“A more frequent subject of doubt is, whether the tumor which projects from the uterus into the vagina is a common polypus, which admits of removal and a permanent cure; or a malignant excrescence, which, if removed, grows again, and terminates fatally. On this question I shall say little at present, because I shall return to it in the second part of this paper, where I speak of some unusual forms of polypus. All I shall remark here is, that whenever the tumor has a stalk, which can be included in a ligature without any danger of including the neck or fundus of the uterus, I would apply it—it succeeds in an immense proportion of cases. I have known it succeed in several, where, from the cauliflower roughness of the tumor, others had been deterred from it; and even if the excrescence should return, the patient is not worse off than she was before. She has had the only chance which art can afford her, and has lost nothing even if it fails.”

The only effectual method of relieving the hæmorrhage and other inconvenience produced by this disease, is removing the polypus. This may be done with the knife or ligature; the latter is invariably used by Dr. Gooch. The instrument consists of two tubes, capable of being separated and joined. It was originally invented by Niessen, a German practitioner, and modified by Levret: a representation of its latest form is to be found in Cooper's Surgical

Dictionary. This instrument has been still farther improved by Dr. Gooch, who has likewise given a representation of it, to which we must refer those desirous of fully comprehending the subject. The ligature being applied round the stalk, it is to be gradually tightened until the tumor drops off, and of course the time required to produce this effect depends on the thickness of the stalk, and the frequency with which the ligature is thus tightened. This is recommended by Dr. Gooch to be done night and morning, in which case it commonly requires four or five days, sometimes only two, but occasionally as much as ten, to remove it.

When the tumor grows from the lip or neck of the uterus, it sometimes only produces leucorrhœa without hemorrhage, and when in this situation does not prevent the patient from becoming pregnant.

The excrescences from the uterus which are liable to be mistaken for polypus, are particularly inquired into. The most remarkable of these is the cauliflower excrescence of the late Dr. Clarke, corresponding to the *vivaces* of Herbiniaux and Levret, and the general result drawn by our author is, that this disease is the same as occurs in other parts of the body under the name of fungus hæmatodes. In all these cases the author advises that a ligature be applied wherever the form of the excrescence is such that it can be entirely removed without including any portion of the uterus, explaining to the patient that it is not done with the same confidence as in common polypus. If the disease be malignant, and the tumor grows again, the patient is no worse off than before. Dr. Gooch regards these excrescences as much less frequent than is generally supposed. "Where (says he) we see one case of cauliflower excrescence we see ten or even twenty of common polypus, and fifty of carcimonia, or malignant ulcer of the uterus." It is also of importance to keep in view that, according to our author, no man can tell "infallibly" by the touch whether the disease be a malignant excrescence, which will grow again, or a common polypus, which will not. The mere roughness of surface, which has been mentioned by various writers, he regards as no sufficient test.

[To be continued.]

ANALYSES OF BRITISH MEDICAL JOURNALS.

LONDON MEDICAL AND SURGICAL JOURNAL.

May, 1829.

I. *An Accurate Report of an Examination for a Certificate at Apothecaries' Hall, London, December 1828.*

MR. HENRY STORER remarks that "great ignorance has been imputed to the Court of Examiners, and their examinations have been ridiculed," in both instances he thinks without foundation. Soon after passing the ordeal, he wrote down the questions in the order in which they had been put to him, and they offer a specimen, in our opinion, of a very fair and proper examination; which we subjoin, as it may be interesting both to teachers and pupils.

1. *In Latin.*—A book of prescriptions was opened, and three were required to be translated grammatically; one very easy, the others difficult.

2. *In Chemistry.*—The Pharmacopœia was opened, and muriatic acid was referred to.

Question. Let me hear you read and translate the method ordered for preparing muriatic acid?

Q. Give me the chemical process which takes place according to the old and new theory.

Q. What is the general principle of acidity?

Q. What exceptions are there to oxygen being the principle of acidity?

Q. What is the composition of ammonia?

Q. What is the composition of water?

Q. What are the component parts of atmospheric air?

Q. What chemical changes take place during respiration?

Q. What is the heat of the blood?

Q. What is the composition of nitric acid?

Q. What are the boiling and freezing points of water?

3. *Materia Medica.*—A large collection of drugs was shewn, without being marked, from which I was desired to select the purgatives, and give their botanical names, which were the convolvulus jalapa, c. scammonia, rheum palmatum—momordica charitium, alopecurus spicatus—stalagmitis combogioides, and cucumis colocynthis.

Q. What kind of purgative is jalap? what are its properties, doses, and preparations, in the Pharmacopœia? and the relative strength and proportion of each?

Q. What kind of purgative is scammony? Is it a gum, and how obtained? Give its preparations in the Pharmacopœia, with doses. Is it given in any particular complaint to children, and with what generally combined as a purgative?

Q. How is elaterium obtained? relate the method, and give its dose, and name the diseases when most required, with the effects and treatment of an over-dose.

Q. Aloes, how many species are there? what kind of purgative is it? give its doses, properties, and preparations.

Q. Where is the colocynth obtained, and when gathered? give a description of the pulp, with the properties and doses of its preparations.

Q. What is gamboge? when and how obtained? give all its history, as before. Is it given to children in any particular affection?

Select the expectorants from these specimens (the drugs shewn us before); viz. callicocca ipecacuanha, scilla maritima, and colchicum autumnale.

Q. What are the uses, doses, and preparations of ipecacuanha? where does it grow? when would you prefer prescribing this in preference to squills?

Q. Where is the squill root brought from? give its characters, uses, and doses, and when it should be discontinued.

Q. For what diseases would you prescribe the colchicum? which is its best preparation? and what symptoms arising should mark its effects?

Select the principal tonics.

Cinchonæ lancifoliæ, oblongifoliæ, and lancifoliæ; gentiana lutea? quassia excelsa; and cocculus palmatu calomba.

Q. How many kinds of bark are used in medicine? give their different characters, with their relative doses and properties; which is most preferred? what effect does the red bark sometimes produce? and what are the complaints in which it is generally prescribed?

Q. Give me the general division of fevers; what do you mean by an intermittent fever? describe the stages of each, and the treatment to be adopted in each stage.

What preparation of bark has been lately introduced? how prepared and given as a substitute?

Q. If bark failed in curing fevers, what remedies would you make use of?

Would you prescribe emetics, and when? would you bleed, and when?

Q. Where is the serpentaria brought from? what are its properties and doses?

Q. What kind of tonic is cascarilla, when most useful, and how usually prescribed?

4. *In Botany*.—A book of plates was shewn; and about twelve were fixed upon; among them were the digitalis, hyoscyamus, belladonna, conium, papaver alb., solanum dulcamara.

Q. Where and when is foxglove usually gathered? give all its preparations and doses; which form is most useful in dropsy? give the symptoms and treatment of an over-dose.

Q. What are the virtues and doses of the solanum dulcamara?

Q. Where is belladonna found? what are its preparations? and what effect has it particularly on the eye? name the diseases where most useful.

Q. How is opium obtained? give the process; enumerate the doses, properties, and preparation, ordered in the Pharmacopœia; give the symptoms and treatment of poisoning, with the tests for detection.

Q. Give me the relative strength of opium in the Tr. Opii, Pulv. Cret. C. cum Opio, and Conf. Opii.

Q. If emetics had no effect, what remedy would you apply in cases of poisoning?

Q. What is arsenic? Describe it particularly; give its doses and diseases when required; give the symptoms of poisoning from arsenic, and treatment you would adopt.

Q. What is the chemical character of corrosive sublimate? name, as in arsenic, all its effects, and symptoms when swallowed in an over-dose, with tests and treatment. How much mercury is in the liq. hyd. oxym.?

5. *In Anatomy, & Practice of Physic*.

—Q. Let me hear you describe the general coverings of the brain; how many sinuses, hemispheres, ventricles, and nerves, arising from it, with a general description of what is seen on cutting it transversely.

Q. Where does the par vagum go to?

Q. Give a general anatomical descrip-

tion of the lungs, and describe what parts are seen in the anterior, median, and posterior mediastinum.

Q. What particular affection attacks the superior part of the lungs? give the symptoms and treatment of pertussis, and of croup.

Q. How would you distinguish gout from rheumatism? name your principles of treatment.

Q. Give the classes and orders in Cullen's nosology.

Q. In what class and order is apoplexy? describe its symptoms and treatment, and how distinguished from epilepsy; would you give emetics in these affections?

Q. What are the exciting and predisposing causes of apoplexy?

Q. What would be your prognosis in this complaint, and the particular practice you would adopt?

II. *Cases in Critical or Periodic Epilepsy, cured by Sulphate of Quinine.* By JOHN EPPS, M.D.

These cases are only two in number, and present no feature of particular interest.

III. *On certain Anomalous Affections connected with Intermittent Fever.* By JOSHUA MANTELL, Esq. Surgeon, Newick.

A very short paper, the pith of which lies in the following sentence:—

“I have known intermittent to exhibit itself under the form of *rheumatic pains*, coming on at a *certain hour of the night*; the patient complaining of severe pain in the chest, with palpitation of the heart, dyspnœa, and pain on attempting to make a rather full inspiration. In such cases no tenderness has existed in the pectoral muscles, and the pulse has remained undisturbed and quiet during the paroxysm, the subsidence of the same being usually followed by a hot, dry skin. In the morning the patient has appeared as well as if nothing had occurred to cause indisposition. These cases at first occasioned some perplexity, but the conclusion was soon arrived at, that they were clearly intermittent, only assuming certain anomalous forms. In every case of such affections, under my own care, the quinine has effected a speedy and permanent cure. Cases have occurred in which the quinine had been administered without

benefit; but in these very cases, by preceding the use of this valuable remedy by an emetic, and a brisk cathartic, complete relief has been invariably afforded.”

That rheumatic pains should come on at the same hour every night, and that they should be cured by quina, will scarcely be regarded as “anomalous” by any one who has seen much of the disease. That the pulse should remain “undisturbed and quiet” during palpitation of the heart, is certainly rather extraordinary.

IV.—*On the Efficacy of Chenopodium Olidem as an Emmenagogue.* By J. HOULTON, Esq.

A solitary case is given, in which a young woman, who had menstruated regularly, but scantily, with pain in the loins, &c. had the secretion in sufficient quantity, and without any distressing symptoms, after taking gr. x. of the Extract of *Chenopodium Olidem*, night and morning, for a fortnight.

V.—*Case of Emphysema of the Eye.* By M. TRUMAN, Esq.

“James Hutchins, aged 38, presented himself, on April 7th, at the Royal Western Hospital, with the integuments surrounding and covering the right eye swollen to the size of an orange. He stated that, on blowing his nose that morning, he felt his eye suddenly compressed, and immediately the swelling appeared; the more he continued to blow his nose, the more the compression and swelling increased.

On being directed to blow his nose, the distension of the integuments and sense of compression became so painful, that he begged us, to use his own words, “to open his eye.” On examining the parts, there did not appear to be any disease of the lachrymal sac or ducts, but the mucous membrane of the nose was loaded with a dry unhealthy secretion; and he stated that, for the last two months, he had been troubled with pain in the upper part of the nose, attended with a discharge of blood and matter; he had never had venereal disease, nor ever perceived any piece of bone come away from the nose.

The patient was admitted into the hospital, and a cold lotion ordered to the eye; the following morning the swelling had subsided, and finding it

did not recur on blowing his nose, he left the hospital, and has not presented himself since."

VI.—*An Essay on the Structure of the Nervous System.* Read before the London Phrenological Society, Mar. 2, 1829. By R. COOPER, Esq.

This essay consists of a rapid, but not uninteresting sketch of the principal facts which have been ascertained with regard to the minute anatomy of the nerves. It is itself an analysis, and does not admit of condensation.

June, 1829.

I.—*Medical Pathology.* Read before the London Phrenological Society, 1829. By JOHN EPPS, M.D.

Two cases intended to illustrate the application of phrenology to practical medicine are detailed, after a few introductory remarks. It is impossible to read these cases without smiling, so entirely destitute are they of any thing tending to confirm the views in support of which they are adduced. The first, being brief, we shall insert.

"Two cases, interesting in reference to phrenology, have occurred lately at the Royal Western Hospital, Nutford-place. The cases came under my own care, and therefore I can vouch for their accuracy. The first is the case of Sarah Smith, a young woman, who came to the hospital a short time since: a friend came with her, she herself being in a highly nervous state. She complained of pain in the seat of the organ of adhesiveness; also of being subject to peculiar nervous feelings, so powerful at times that she could scarcely stand. The pain, on inquiry, was found to have come on immediately after having heard a report, which, however, was false, that her sister had fallen into the fire, and was burned. She stated, in addition, that when she is busy she does not feel this pain, and does not have the curious feelings. Her heart palpitates, and when asleep she dreams, and the object of her dreams is her brother, or some of her family. She soon became better by the use of means which were applied with the view of exciting an action contrary to the diseased action in adhesiveness, and which, being kept up, have restored her to health."

The second is the case of a man addicted in youth to masturbation, and in

manhood to women. He had palpitations, weakness in the loins, and pain in the back of the head, "in the region of amativeness." The application of phrenology, to practice, in this case consisted in the application of a blister (*we presume* to the back of the head or neck), a stimulating embrocation to the loins, and the internal administration of tonics. Under these means the patient recovered. *Query*, how would any one unacquainted with phrenology have treated such a case?

II.—*Remarks on Mr. Stone's "Evidences against the System of Phrenology," No. VII., including a Comprehensive View of the New Theory of Temperament.* By DR. THOMAS DE TROISVEVRES.

A review continued from former Numbers.

III.—*Case, illustrating a remote consequence of Indigestion.* By J. RAWLINGS MONDAY, Esq. Surgeon, Olveston.

A case of phthisis pulmonalis, in which, in addition to the disease in the lungs, tubercles were found in the peritoneum, with some appearances of disease in the mucous membrane of the alimentary canal.

IV.—*Observations on the State of the Urine in Incipient Phthisis.* By F. BAILEY, M.D.

From these observations it appears,

"1. That, of 33 specimens of urine, 15 were distinctly acid, and 12 neutral; of the remaining six, two were very faintly acid, altogether without crystals, and four very faintly acid, with a few minute crystals.

2. That the colour of transparent urine affords no criterion of its nature; the amber tint being equally common to the acid and the neutral kind.

3. That the appearance of crystals on the surface of urine, especially if abundant, is an almost certain proof of its neutrality.

4. That the turbid yellow urine, or that abounding with lithate of ammonia, has the greatest specific gravity; that, in general, the deep amber coloured comes next, and that the very pale water is uniformly the lightest.

5. That the transitions from an acid

to a neutral state are very frequent, and take place in a very short space of time.

6. That the daily recurrence of feverish paroxysms are not incompatible with a uniformly transparent state of the urine.

7. That, taking 5 grains as the average of matters held in solution by 7 fluid drachms of urine, and that fßiss. of that fluid are discharged daily, about 2 drachms of such matter will be eliminated from the system in that interval by the kidneys.

8. That the specific gravity of acid urine generally exceeds that of the neutral kind."

MEDICAL GAZETTE.

Saturday, June 27, 1829.

"Licet omnibus, licet etiam mihi, dignitatem *Artis Medicæ* tueri; potestas modo veniendi in publicum sit, dicendi periculum non recuso."—CICERO.

OPERATION FOR ANEURISM.

IN the present number (page 123) will be found an interesting case from Paris, to which we would direct particular attention; viz. an aneurism of the subclavian artery, in which M. Dupuytren applied a ligature beyond the tumor.

The operation of tying vessels on the distal side of aneurismal tumors has met with little encouragement from English surgeons. It has been performed, indeed, in one or two instances by persons who had no professional reputation to lose, and who have taken the chance of gaining a little *eclat* in the event of its success: but the case to which we now direct attention is the first, with the exception of those published by Mr. Wardrop, in which a surgeon of known talent and experience has adopted this method, since it failed in the hands of Deschamps, Sir A. Cooper, and Sir E. Home: we believe, however, that in these three operations the cases were almost desperate, and therefore they cannot be regarded as conclusive evidence against the method of Brasdor.

The *prima facie* evidence of Mr. Wardrop's cases is strongly in favour of the operation: nevertheless it has notoriously made very little impression in this country; a circumstance partly owing to the general belief that the nature of some of the cases had been mistaken, partly to the disclosures made by dissection in others, and partly to the contradictory statements published with regard to the last case—that of Mrs. D. It is remarkable that M. Dupuytren, in explaining the motives which had induced him to adopt this method of operating, alluded particularly to the cure which had been effected in this case. We say *cure*, because, knowing as we do, that Mrs. D. is now labouring under an aneurismal tumor at the upper part of the chest, which is apparently carrying her by slow but progressive steps to the grave, and collating this circumstance with the stress laid by M. Dupuytren on the alleged success of this case, it affords a very strong confirmation of the remarks we formerly made, in speaking of this operation, in one of our early numbers; and shews the imperative obligation of the surgeon to give the results of his trials, in all such cases, with absolute candour and good faith*.

We agree with Dr. Barry, that "this hazardous operation should be viewed in all its bearings by other eyes than those of the man whose zeal for the improvement of chirurgic medicine first led him to perform it, but whose cooler judgment may for a moment have been dazzled by the brilliancy of the anticipated results." It would be difficult to select any one better calculated to examine the subject coolly and without prejudice than M. Dupuytren, whose mind is imbued with zeal, but is without enthusiasm—who is

* After the operation, M. Dupuytren was informed of the present state of Mrs. Denmark by some English gentlemen present.

no partizan in this matter, and who, therefore, will have no object but to discover the truth. The undoubted nature of the case—the public locality of the patient—and the character of the surgeon—all conspire to render this an *experimentum crucis*, and will do more to settle the question than all the trials that have hitherto been made.

As to the relative degrees of facility in applying a ligature upon the artery in different situations, our correspondent informs us that it appeared to him, judging by the present case, that the different steps of the operation are more easy, more precise, and of more certain execution in the operation below than in that above the clavicle—assuming always that there is no displacement of parts.

[A CORRESPONDENT has favoured us with the following somewhat singular document: there is little difficulty in guessing who is the author.]

THE BRITISH LADIES' LYING-IN
INSTITUTION,

For Female attendance upon poor Married Women at their own habitations, for providing them with the use of Linen during their Confinement, and for the Instruction of respectable Women in the practice of Midwifery.

Patronesses—The Duchess of Argyll, the Countess of Mount Charles, the Duchess of Richmond, Lady Agnes Byng.

President and Honorary Treasurer—Sir Anthony Carlisle, F.R.S. &c. &c.

Consulting Surgeon—Joseph Houlton, Esq. &c. &c. **Secretary**—Mr. T. Beale.

Instructing & Consulting Midwives—Mrs. Martin, Mrs. Richardson, Mrs. Delpini, Mrs. Gamman.

This institution is intended to restore midwifery to its natural and becoming management among females, from whom the practice has, of late years, been improperly taken by an inferior order of medical men, under the false pretence that childbirth requires medical or surgical interference. This assertion is, however, disproved by the total rejection of artificial means during childbirth, by the most populous nations on the earth, in all climates, and under every diversity of human life. Even on

the Continent of Europe, and especially in France, where man-midwifery became fashionable during the last century, that indecent vocation has never been general, and it is now returning back to females. In England the present excessive increase of medical men has occasioned a deficiency of employment for beginners, and these mercenary persons who teach man-midwifery are led to instigate their pupils to terrify married women, and to abuse female-midwives, for the purpose of gaining an ascendancy in families. In this way the indecent practice is extending, and it threatens to supersede the ordinations of Providence, by introducing violent and dangerous measures instead of natural offices. The male practitioners of midwifery are in continued distraction about the mysteries of childbirth, and they differ from each other upon every point of artificial interference. With such notorious evidence, daily found in medical books, and in which the bitterest accusations, touching the injuries or death of mothers and their infants, are made public, we cannot yield up our judgments to their specious pretences of anatomical science and manly violence; but we boldly assert, that the mischiefs which men-midwives deprecate, are chiefly, if not entirely, created by their own indiscreet and uncalled-for meddling interference and haste. We do also confidently assert, that more women perish under the hands of men-midwives than among female-midwives, who, with sexual compassion, and from their personal feelings, are induced to await, with more patience, the providential course of nature. With these convictions, we publicly denounce the employment of surgical instruments, and of every sort of manual violence during the hallowed proceedings of labour. We dispute the superior success of the best-informed among men-midwives, while we deny the capability of *young* men, and abhor their indecent presence on such occasions.

This institution has been established and promoted by several ladies, has met with the patronage and support of the nobility and gentry, the countenance and encouragement of the public, and is intended to be made the happy means of administering relief and comfort to many truly valuable and modest mothers.

The present age is not more distinguished by its knowledge and refinement, than by its attention to the wants and the cries of the indigent; and, to the honour of the British nation, there is scarcely a calamity incident to human nature that has not some charity instituted for its relief, it being undeniable that to alleviate the distresses of our fellow-creatures is becoming every citizen and christian.

If there be any persons in the community who have a prior right to the notice of a charitable public, it is surely the poor modest industrious married woman, particularly at a period when she requires the union of kindness and sexual assistance to sustain and help her. The pressing necessities of the labouring members of the community call upon those whom Providence has blest with affluence, to support this and similar institutions; the promotion of female modesty being essential to every domestic virtue, and to general morals.

The present reduced number of respectable midwives must be obvious to those ladies (and happily there are many) who object, from motives truly honourable to themselves, to male practitioners; and who have consequently proffered us their patronage in affording instruction and experience to respectable and well-educated females, and thereby to replace the practice in the hands of that sex, for which nature and female decorum designed it, and with whom it rested until the French introduced the practice of men.

Any lady or gentleman becoming a subscriber of two guineas or more per annum, will have a right to recommend four objects for every two guineas they subscribe (so long as they continue their subscriptions), and to vote at all elections.

The subscription of twenty guineas at one time, will constitute the donor a life subscriber, and will entitle her or him to recommend four patients every year.

Ladies (subscribers or otherwise) are respectfully informed, that donations (however small), or materials of every description in aid of the linen depôt, will be gratefully received.

Donations and subscriptions are received by the Treasurer, &c. &c.

N.B. Those ladies who may prefer the attendance of respectable and skil-

ful females in their accouchements, are respectfully informed that they may be waited on at an hour's notice, by sending a line to the consulting midwife, at the institution, 10, Chapel-Street, East, May Fair.

PROCEEDINGS OF SOCIETIES.

HUNTERIAN SOCIETY.

June 10, 1829.

DR. BILLING, PRESIDENT, IN THE CHAIR.

THE evening was occupied in the discussion of some points connected with vesical and prostatic calculi, and colica pictonum.

Mr. KEY related instances of stone in the bladder, in which the patients were able to jump from a table without inconvenience; and described the circumstances under which this was likely to happen. Alluding to a case that had been related at the preceding meeting, he expressed his belief that the symptoms of prostatic calculus were very different from those of vesical: they rather, he said, resemble the symptoms of stricture. He detailed two cases in elucidation of this opinion. In the first case he had to remove a stricture before he reached the prostate, when he discovered a calculus, and removed by operation calculi of phosphate of lime weighing 1200 grains. In the second case also the symptoms of stricture had existed: the calculi in the prostate occasioned ulceration of the urethra, and consequent extravasation of urine; fistulous openings formed in the perineum, scrotum, sides of the rectum, and into the rectum: he removed two calculi from the prostate, and the fistulæ are closing. Where the calculi can be taken hold of, he preferred breaking them down, and mentioned a case in which he had removed large portions in this way. He also adverted to a case of calculi in the bladder, formed in consequence of communication between this viscus and the colon, now under treatment. The patient is a woman, æt. 64; twenty years ago she found that flatus of a very offensive odour escaped from the bladder. There was no derangement of health till of late, when symptoms of stone came on, and the existence of

calculus was ascertained by examination. The urethra was dilated, and six small calculi, of a dark colour, were extracted by the forceps. They have not yet been analyzed, but he supposed that they would be found to have a faecal nucleus. The urine in this patient was extremely acid, and after exposure did not become ammoniacal, but retained its acid properties during many hours. He inferred from this circumstance that the bladder was healthy. The communication appeared to be between the fundus of the bladder and the lower part of the colon; and he had seen fragments of wood, and other foreign matters taken with the food, which had been voided from the bladder.

Dr. WHITING submitted to the Society a set of cases of paralysis from lead, in which he had derived great advantage from a very simple mode of treatment. Having been frequently disappointed in using the means ordinarily resorted to, he was led to try local irritation alone, blistering, or irritating the skin by other means, from the shoulder to the hand, either at once, or by successive applications. The result had been quite satisfactory. He attributed the efficacy of the plan to the increased flow of blood into the limb. The mere stimulation of the muscular fibres, as by electricity, he had found of no avail. He imputed the paralysis to the lead having in some way intercepted the supply of blood to the part; and the colic, he said, had been proved to arise from palsy of the bowels, not from spasm.

Dr. BENJAMIN BABINGTON adverted to one of the practices among the devotees of India—that of holding up the arms, perhaps for years—as elucidating some of the effects of cutting off the supply of blood. At first the arms of the devotee are tied up, but they soon become so stiff that this assistance is unnecessary. He had one opportunity of examining the withered limb of one of these persons: it was mere skin and bone, and the joints were ankylosed—effects which he thought were partly attributable to the deficient supply of blood. The Doctor entertained the opinion that the extensors were often paralysed in colica pictonum, when the flexors remain capable of acting; and thought that the nervous system was more implicated in the paralysis than Dr. Whiting seemed to suppose.

The PRESIDENT and Mr. T. MEERES coincided in the opinion that the extensors are most frequently the muscles paralysed; the former said that he had never seen the whole of the muscles of a limb paralysed from lead.

The remainder of the evening was taken up in considering the principle on which splints were resorted to in this affection, and their utility.

EXTRACTS FROM JOURNALS,

Foreign and Domestic.

CASE OF AMNESIA.

By Samuel Jackson, M.D.

THE Rev. Mr. R. the subject of this case, is aged forty-eight years; he is of the sanguine temperament, ruddy complexion, light-coloured hair and eyes, and has lately manifested a strong tendency to obesity; his health for many years has been excellent; he is not subject to head-ache, or to any nervous symptoms. His intellectual faculties are of a high order, but have not been as actively employed as formerly, and he has experienced some mental anxiety; his temper is placid, with a disposition bordering on gaiety.

On the 5th of September last, early in the morning, he awoke with head-ache, after a restless night. He had, the preceding evening, been exposed to the night air, by which the perspiration, which was usually copious, received a sudden check. He took some castor oil, which acted freely in a short time, after which he again laid down. About 11 o'clock, Mr. H. who resides in the same dwelling, went into his room to inquire respecting his health, and was surprised to find Mr. R. could not answer his questions. Alarmed at this circumstance, he immediately requested me to visit him.

I found my patient in bed, evidently in the full possession of his senses, but incapable of uttering a word. I examined the tongue, and ascertained it was not paralysed, but could be moved in every direction. All my questions were perfectly comprehended, and answered by signs; and it could be plainly seen, by the smile on the countenance, after many ineffectual attempts to express

his ideas, that he was himself surprised and somewhat amused at his peculiar situation. The face at this time was flushed, the pulse full and somewhat slow, and to my inquiries if he suffered pain in the head, he pointed to the front of his forehead as its seat. I directed hot water to be brought in a bucket, for a pediluvium, and made preparations to draw blood. Mr. R. exhibited at this time a strong desire to speak, and, after a great many ineffectual efforts, endeavoured to make me comprehend his meaning by signs. Finding I could not understand him, he made a sign that he would write. When furnished with pen and paper, he attempted to convey his meaning, but I saw he could not recall words, and that he had written an unintelligible phrase.

Forty ounces of blood were drawn from the arm, and before the operation was completed, speech was restored, though a difficulty continued as to the names of things, which could not be recalled. The bleeding and pediluvium produced some faintness, and he was placed in bed. The loss of speech appearing to recur again, in fifteen minutes ten ounces more of blood were abstracted, and sinapisms applied to the arms, legs, and thighs, alternately: the skin became moist and the head-ache was relieved. The sleep that night was disturbed by uneasiness and throbbing in the head, which disappeared in the course of the 6th, and no further return of the affection has occurred.—*American Journal of Medical Sciences*.

COUGH FROM ELONGATED UVULA SUCCESSFULLY TREATED.

By Thomas Henderson, M.D.

In the year 1814 Mr. ———, aged forty, served a tour of militia duty at Norfolk, as an officer. He contracted a gonorrhœa; the disease was apparently cured; but he thought it was never perfectly removed. I speak of his own impressions. Six months before applying to me he was taken with sore throat, ulcerated, excavated, ragged looking tonsils. The disease extended to the uvula, inducing inflammation and elongation.

He had no fever nor pain. The stomach and bowels were irregular in their functions: the tongue was slightly furred; the pulse increased in frequency.

But the symptom which occasioned

alarm was excessive and constant coughing. The irritation induced by the cough occasioned great emaciation, to such a degree that his friends all supposed him in consumption, and his case incurable.

The ulceration of the throat was improving, but the uvula was long, and the end almost cartilaginous: it was evidently the cause of the cough. I advised and performed the excision of the part. I can never forget the confidence with which the patient immediately exclaimed "I am well," nor how suddenly the cough left him.

I gave him a slight course of blue pill, which removed all the symptoms by restoring the functions of the stomach and liver, on the irregularity of which I supposed the state of the throat to depend.

I have since cut off an elongated uvula which I was sure produced cough and irritation. The gentleman left town immediately after the operation, and I heard nothing of him afterwards*.—*Amer. Jour. Med. Sciences*.

COMPARATIVE EFFECTS OF LIQUID AMMONIA AND COLD AFFUSIONS IN POISONING BY HYDROCYANIC ACID.

Among the remedies proposed in cases of poisoning with prussic acid, ammonia has attracted peculiar attention: it is true that, administered directly after the ingestion of the acid (if the dose has not been so strong as to produce death if the animal is abandoned to itself), it will diminish the effect of the poison; but if some time has elapsed after swallowing the acid, and the quantity has been sufficient to produce death, ammonia

* We make the following extract from Wiseman's Surgery, published in 1676. "There also happeneth an elongation of the Vvula through the abundance of salivous humour flowing upon it: in which case, if it touch upon the root of the tongue or upon the epiglottis, it causeth a frequent hauking, and in progress maketh a vexatious catarrh.

"Such was the case of a servant-maid to a noble lady in the country. Various medicaments had been prescribed ineffectually; I being in that family was desired to see her. Looking into her mouth, I saw the Vvula hang dangling upon the root of the tongue. It was not swelled nor inflamed. I supposing it the cause of her distemper, took hold of the low part of it with my forceps, and at the same time cut it shorter with a pair of scissors. It did not bleed a spoonful; and afterwards it cicatrized of itself, without application of any kind of medicament, and she was thereby freed of the defluxion. Such another I cut off in a servant of his Majesty belonging to Hampton-Court, and some others who were so afflicted, and thereby freed them of their catarrh, when all other remedies failed," p. 333.

has no longer the desired effect; and if it is used mixed with water, that effect is still farther diminished. When pure liquid ammonia is employed immediately after a deadly dose of hydrocyanic acid, the following effect is generally found to take place:—the animal, which is in a state of spasm, recovers suddenly the use of its muscles, gets up, runs a few paces, then falls down and remains in the same state as before, only the spasms are not so violent. The same thing recurs upon administering a fresh dose of the ammonia. If these are continued, the animal may recover little by little; but in the majority of cases the ammonia ceases, after the first dose, to have any sensible effect; life is indeed prolonged, but the animal is no less certainly destroyed. It should not, likewise, be forgotten that the difficulty of swallowing renders this remedy uncertain. The effects of hydrocyanic acid are more certainly arrested by the continual affusion of cold water upon the head and spine of those who have swallowed it; at least such is the result of experiments made upon dogs and other animals. It has been given to dogs and cats in various ways, in different degrees of concentration, and under variety of circumstances, and they have recovered by means of cold affusions, perfectly and speedily. When the dose of the acid has been so powerful as to kill instantly, of course no remedy will avail; but those doses which would produce death after the lapse of some instants, have been remedied where time has been allowed for the use of the affusion, and at the end of some hours the animal has presented no traces of disease. When the dose of the acid has been so weak as not to be mortal, one or two affusions have been sufficient to overcome the symptoms. The success appears to bear a proportion to the celerity with which it is employed. It may be reckoned certain when taken immediately after the ingestion of the acid, or, during the period of spasm, whilst the muscles are in a state of contraction, the eyes fixed insensible and motionless in their orbits, the head thrown back, and the limbs rigid; but in the state of relaxation which ensues, cold affusion can reanimate the animal when life is nearly extinct: a fresh contraction of the muscles is then the consequence of its employment; the muscles become hard, the limbs rigid, and by degrees the

healthy actions of the parts are restored. Dr. Herbst relates many experiments upon which the above conclusions are founded.—*Journal Complimentaire*.

EXTRAORDINARY GROWTH.

Dr. Bedor was requested to see a young man whose situation was considered by his medical attendant to be very precarious. The symptoms denoted organic disease of the heart and great vessels, and he was evidently in a very dangerous state. He had been measured three months before, when he was five feet three inches in height. At the end of 25 days he was again measured, and he had increased in stature *three inches*. A few days after this the patient died suddenly. He was only 19 years of age, and had attained the unusual height of six feet three inches at the time of his decease.—*La Clinique*.

ERUPTION OF MEASLES AFFECTING ONLY ONE SIDE OF THE BODY.

A child, three years of age, had been observed never to perspire but on one side of the body. This singular anomaly had for some time ceased under the use of general bathing. The child was afterwards attacked with measles, and the eruption only appeared on that side of the body which had before exhibited the disposition to perspiration. The case did well.—*Rust's Magazin*.

HOSPITAL REPORTS.

HOTEL DIEU.

*Aneurism of the Subclavian Artery—
Ligature of the vessel on the distal
side of the tumor*.*

N. —, æt. 40, a day-labourer; five months before his admission into the Hotel Dieu, on the 28th May, and when in good health, suddenly felt pain at the bottom of the neck, on the right side. Two days afterwards he perceived a small swelling, the size of a nut, in this situation; and this increased in size, his arm at the same time becoming weak and feeling numb. A practitioner who was consulted, immediately recognised the case as one of

* The account of the patient's previous history is taken from the *Clinique*. The notes of the operation are furnished by a correspondent who was present.

aneurism; but the treatment, consisting of absolute rest, and the constant application of ice, failed to arrest the progress of the symptoms. The tumor increased in size, though slowly; and the patient, unable to make use of his arm, came into the Hotel Dieu.

Since his entrance, notwithstanding that blood has been abstracted seven times by venesection, and the tumor has been kept continually covered with evaporating lotions and pounded ice, it has increased in size. Its bulk at present (June 12th) is that of an ordinary-sized hen's egg, occupying the situation of the right subclavian artery, from its exit between the scaleni to the clavicle; upwards and outwards towards the trapezius it projects considerably; below the clavicle the axillary artery seems sound; the trunk of the common carotid is healthy; the pulsations of the commencement of the subclavian and of the arteria innominata are strong, large, and seem to indicate a dilatation of these vessels. The general health is good; the action of the heart is attended with no unnatural *bruit*, but the pulsations of the ventricles are strong and sonorous, and heard over a sufficiently extensive surface; respiration is easy, and the patient scarcely ever coughs. The right arm and hand are somewhat œdematous; the fingers are half closed, and the patient can neither open nor shut them more; the whole limb feels numb. The *moral* is good. The venesections have somewhat weakened the patient, but he feels no pain; the evacuation of the bowels is regular, the tongue is clean, and the sleep tranquil. He lies on his back, the only position which he can continue to preserve. The colour of the integuments of the affected limb and its temperature are natural.

M. Dupuytren, in his remarks upon this case, observed, that its nature, but more particularly the situation of the disease, leave but few resources to the surgeon, and these very precarious. A ligature cannot be placed on any point of the subclavian artery, even were the proceeding of exposing this vessel on the cardiac side of the scalenus anticus muscle resorted to, for the size of the pulsations felt in this situation do not allow us to suppose that the artery is here healthy. As to the ligature of the arteria innominata, executed by Mott, of New York, in 1818, and by

Graefe, of Berlin, in 1822—the consequences of this bold operation in these two cases are not of a nature to encourage us to try it again: moreover, in the present case, pulsations are felt as far as, behind the sterno-clavicular articulation.

There remains, then, the application of a ligature on the artery beyond the aneurismal tumor; a method of treatment which has of late been strongly recommended by Wardrop, by whom this operation has been several times performed with success. It appears that of eight cases in which this proceeding has been followed, five were cured. In one case, where the arteria innominata was probably the seat of disease, Wardrop, in 1827, tied the subclavian only, and the patient was quickly cured. The following year Evans, in a case of a similar description, tied the trunk of the common carotid, and the success was no less. Theoretically speaking, it has been said that this method was only applicable when no branch is given off from the vessel between the aneurismal sac and the point at which the ligature is applied, as, under opposite circumstances, a branch allowing the passage of blood would hinder the coagulation of that in the tumor; but experience has shewn this objection not to be valid, and as success has attended such attempts, we ought not to despair of it in similar cases.

Considering the circumstances of the present case, its history, the man's age, his health, and the failure of the other means employed, M. Dupuytren determined upon applying a ligature on the commencement of the axillary artery, as the only treatment which offered some chance of success. Accordingly, on the 12th inst. the operation was performed. The patient being placed on the table on his back, an incision was made below the clavicle, beginning close to the edge of the deltoid, and extending about two inches and a half towards the sternum, in a direction nearly parallel to the clavicle. The skin and fat being divided, the incision was carried through the pectoralis major; about two-thirds of the pectoralis minor and the fascia were then divided, when the axillary vein presented itself greatly distended, and enlarged to several times its natural size. Being pulled aside, the artery was exposed, and a ligature readily carried round it;

and it having been first ascertained, by raising the vessel by means of the ligature against the point of the finger, that the artery at the wrist was stopped, thereby the ligature was tied. The wound was then dressed simply.

During the operation, more especially in dividing the fat and cellular substance, several arterial branches were divided and tied by the operator as he proceeded; in all, we believe, ten. After the first incision through the skin and fat, the other parts were divided upon a director. The different steps of the operation were executed with great precision, and no difficulty occurred, as often happens above the clavicle, in getting the ligature around the vessel. The operation was performed without any attempt at display; there was no hesitation, and no hurry.

15th.—The aneurismal tumor has diminished in size, and its pulsations are less strong. The patient's state is favourable; there is no fever. M. Dupuytren observed, "the operation has produced no bad symptoms; as yet, it has determined nothing with regard to the success of the method of treatment."

Fracture of the Sternum and supposed Contusion of the Heart—Recovery.

J. B. Fraieur, 24 years of age. The shaft of a cart was pushed against his breast with such force that the sternum, and the sixth and seventh cartilages of the ribs on the left side, were forced in, producing immediately general weakness, difficulty of breathing, and syncope. In a few moments he recovered so far as to conduct his charge to its destination, but his sufferings then becoming great, he determined to go to the Hotel Dieu on the evening of the 14th April. When seen by the surgeon, was lying supine, with a flushed countenance, and difficulty of breathing, but without any spitting of blood; the pulse was strong, full, and frequent; the anterior part of the chest, less convex than natural, was raised up by the pulsations of the heart with so much force, and to such an extent, as to lead to the belief that the pericardium and heart were wounded, and the more especially as the patient never had experienced any such palpitations previous to his accident. On applying the hand to the sternum, the fragments of the bone were distinctly felt; and on carrying the hand to the

left of the lower fragment, and pressing slightly, an obscure crepitation was produced by the rubbing of the broken cartilages. (Bleeding to the amount of three pallets, dressings with compresses dipped in cold water, bandage round the body.)

The next day the patient's condition was the same. There was a little cough. On applying the stethoscope, the respiratory sound was heard throughout the whole lung; nevertheless the volume of air introduced by inspiration appeared but small. (Bleeding to three pallets, diet and pectoral ptisan.)

On the 16th April the pulsations of the heart were less forcible, the chest was not so much depressed, the pulse not so full, and there was a little blood in the expectoration.

On the 17th there was no change.

18th.—A marked improvement; more blood in the spula; and from this time to the 27th the man advanced regularly to recovery; the depression of the sternum and the cough have disappeared.

On the 27th the callus was readily traced; nevertheless the palpitations persisted, though in a less degree, and unattended with pain; but this excited no uneasiness, since so much time had elapsed since the accident; in fact, by the 12th of May, they had nearly disappeared, and every thing announced that the patient would soon quit the hospital cured.—*La Clinique.*

ST. GEORGE'S HOSPITAL.

I. Case of Staphyloma.

ANN HAMSON, admitted March 24, with staphyloma of the right eye, in consequence of small pox ten years ago.

The whole cornea was considerably prominent, and the schlerotic also projected rather more than natural. The cornea was opaque, except at one part near the circumference, where the dark colour of the iris was allowed to be seen, apparently in close contact with the cornea, making it probable that the lens had bulged forward, though this could not be completely ascertained. The surface was ulcerated rather deeply in the centre, in consequence of the application of caustic a short time ago, since which time there has been a faint perception of light,

She frequently had inflammation in consequence of the projection of the eye between the eyelids; and from this circumstance, and

the deformity occasioned by the prominence, she had for some time been unable to obtain a situation as a servant.

April 2.—The inflammation having been subdued, Mr. Hawkins proceeded to the operation. A hook having been passed with the left hand through the projection, the tumor was removed by a cataract knife, the part taken away, consisting of nearly the whole of the cornea, and a small portion of the schlerotic coat, where it contributed most to form the tumor. The lens, which was transparent, escaped with a small part of the vitreous humour, apparently in a softened state. The iris adhered to the inside of the cornea, and was quite reticulated, from being so much thinner than usual. In the evening there was a good deal of pain in the eye and head.

V. S. ad $\frac{3}{4}$ x.

4th.—A slight attack of erysipelatous inflammation of the eyelids and side of the face, with febrile symptoms.

R. H. Salin. $\frac{3}{4}$ ss.

Liq. Antimon. Tart. $\mathfrak{m}\mathfrak{xv}$.

Magn. Sulph. $\frac{3}{4}$ ss. M. 6tis horis sumend.

10th.—There has been no pain or inflammation the last two or three days. The schlerotic has contracted so that the aperture is much smaller; very little of the vitreous humour has escaped, so that the eyeball retains its shape and nearly its size, and the surface of the humour has a covering of lymph.

To-day she complains of pain in the side of the head, and the conjunctiva is very vascular.

Hirud. vj. Tempori. Fetus Papav.

11th.—Eye swollen, and discharging a small quantity of brownish pus.

Hirud. iv. Temp.

From this time the inflammation subsided gradually, and the edges of the cut surface approximated. A small fungus, however, rose in the centre, which required the constant application of lunar caustic to bring it to the level of the incision. In the middle of May little more than a transverse line marked the situation where the cornea had been removed, and the eyelids had only become slightly flattened, as so much of the globe of the eye remained. This circumstance was found to be a great advantage when a false eye was used, as the motion of the eye remained quite unimpaired, which can scarcely be the case, we imagine, when much of the globe is lost, as the muscles must lose some of their tone when so much shortened, as seems likely to happen if much of the schlerotic coat is removed, and a small button only left by the subsidence of the coats after the entire loss of the vitreous humour. This patient has an eye which

moves so completely with the sound one that it requires some attention to distinguish one from the other; indeed one gentleman did actually mistake the artificial eye for the natural one.

II. Case of Ann Woodward continued.

In page 787 of the last volume we gave an account of extensive injury of the knee-joint, with extravasation of blood and supuration beneath the fascia of the thigh, which we continued to May 5th, when the patient, Ann Woodward, was doing well. Since this time she has had much more to go through.

May 12.—Attacked with erysipelas of the outside of the thigh. Half her wine was left off, but the bark and porter were continued.

21st.—The erysipelas has subsided, and the wound in the thigh, the healing of which had been stopped by the inflammation, has again become healthy. Yesterday, however, the inside of the thigh became hard and inflamed to some extent, and to-day it has put on the characters of erysipelas. The limb was placed in long junks, and a lotion of liq. ammon. acet. and spirit of wine used.

The erysipelas continued to spread down the leg to the foot, producing a great deal of œdematous swelling, but little pain. Inflammatory redness also returned in the hard swelling of the outer part of the thigh, where the first attack of erysipelas appeared; and a small sinus reopened at this part, but soon subsided, and the ulcer continued to heal notwithstanding the erysipelas. Very little constitutional disturbance was excited by this extensive and long continued inflammation of the whole limb; and the same treatment was continued throughout except the employment of the erysipelas ointment instead of the lotion.

June 5.—The erysipelas has wholly gone, but the œdematous swelling has not much diminished. To-day a sinus was perceived leading from the wound on the outside beneath the skin to the inside of the thigh. This was laid open with a bistoury, and a considerable cavity discovered, leading below the sartorius muscle towards the ham, containing a good deal of pus mixed with sloughy cellular membrane. She seemed rather low, but had little constitutional affection. A solution of chloride of lime was injected into the cavity of the abscess, and her wine increased to a pint daily.

9.—The sloughs have separated; the discharge has become healthy, and is diminished in quantity, and a boundary has been established round the abscess. The healing of the ulcer on the outside of the thigh proceeds rapidly, and both the femur and bones of the leg appear to have united firmly; her general health is perfectly good.

Half the wine taken away.

14.—The abscess is now filling up, and

the œdema of the leg and foot is slowly diminishing

Ordered to discontinue the wine, and to take an additional pint of porter in the day.

The progress of this extensive injury, and complicated as it has been, and increased by two attacks of erysipelas, and by deep and extensive suppuration from extravasation of blood, (for the second abscess in all probability arose from this originally), has been very remarkable, as it was scarcely expected on her admission that she could have survived the injury itself. It has served, however, to shew the powerful influence of a placid and quiet mind upon bodily complaints, for her patience has been most exemplary through the whole of her confinement; and unless something unforeseen should occur, there is every prospect of her soon being able to get up again.

GLASGOW ROYAL INFIRMARY*.

Partial Palsy cured by Strychnia applied locally.

JOHN GREENSHIELDS, aged 56, an habitual drunkard, admitted on account of a varicose ulcer of the right leg. Ten days previously he suddenly lost the power of the left fore-arm and hand; the sensation of the parts remained perfect, but he was unable to take hold of any thing, or to extend the wrist and finger joints; had no head-ache. Being costive, his bowels were freely opened. A blister was then applied to the back of the fore-arm, and one-eighth of a grain of strychnia sprinkled over the vesicated surface. On each successive day the application was increased, by adding the original quantity to that of the preceding day, till it amounted to one grain, after which one-fourth of a grain, instead of one-eighth, was to be added. From the second week he felt the parts to improve in power daily, with occasional sensation of prickling along the fore-arm and fingers. No obvious constitutional effect ensued. He was dismissed cured five weeks from the commencement of the treatment.

In the case of another man admitted in August, with paralysis of flexor muscles, and diminished sensation of the right leg from knee downwards, a similar practice was pursued, with the same good effect. He was dismissed cured, having been under treatment during six weeks.

At La Pitié, Dr. Bally is in the habit of treating cases of partial palsy in the above way, and is said to be very successful. In some cases, he has made trial of the medicine internally without benefit.

Extirpation of enlarged Clitoris and Nymphæ.

Jane Johnson, aged 20, admitted 4th July. The clitoris was as large as a hen's

egg, exceedingly hard and irregular on the surface, with a superficial foul ulcer of the size of a shilling on its summit. The right nymphæ was also very much enlarged and indurated, being attached by a broad thickened base two inches and a half in extent. The mucous membrane on its inner surface was inflamed and ulcerated. The left nymphæ, although much less in size, was equally hard, and had likewise a broad attachment. The mucous lining of the vagina, all around to the distance of half an inch within its orifice, was thickened, and covered with warty excrescences. The labia were free from hardness or swelling.

The clitoris had been about half the size of the thumb as far back as she recollected. It began to get larger three years prior to admission, and in the course of twelve months thereafter became affected with occasional shooting pains. About this time the right nymphæ began to swell. The ulceration had only existed during three weeks, and within this period the pains had increased both in frequency and severity, not only preventing sleep, but in every other respect rendering her life miserable. Her general health was fast falling off; the pulse was quick, and she had frequent rigors, followed by cold perspirations.

By advice of a consultation, the whole of the indurated parts, including clitoris, nymphæ, &c. were removed on the 8th. The woman having been previously secured in the same position as for the operation of lithotomy, an incision was made on the inside of each labium, and extended around and within vagina, to beyond meatus urinarius. About half an inch of the urethra, which felt hard, was also removed. She lost a considerable quantity of blood during the operation, which she bore well. Six small arteries were secured. A gum elastic catheter was introduced, and the parts dressed with oiled caddis.

Recovery in this case was rather tedious, in consequence of three attacks of fever, with erysipelatous redness of surface of buttocks, lower part of belly, and thighs*. The first occurred immediately subsequent to the operation, and was cut short by epistaxis on the third day. The second took place on the eleventh day from the operation, having been quite free from complaint during the five or six preceding days: of this she got better by the use of diaphoretics, and the evaporating lotion to the affected parts. The third, which was rather a relapse than a new attack, happened on the eighteenth day, and before the redness of the former had disappeared. This was accompanied with much irritability of stomach, and other symptoms of debility, for which wine and quina were administered with the most marked effect.

* These, as well as the cases in our number of June 6th, are taken from the Glasgow Med. Journ.

* During the whole of the attacks, the inflammation was of the character of simple erysipelas, there being scarcely any swelling, and no tension.

Warm fomentations were used instead of the evaporating lotion.

As confinement in the hospital seemed evidently to favour, if not to occasion, these relapses, she was dismissed convalescent, though in a very weak state, thirty-one days from the operation. The wound was then in progress of cicatrizing, and very soon healed after she had left the house, since which she has enjoyed excellent health.

The clitoris and nymphæ, on being divided, exhibited an uniformly dense hard surface, though with none of the ligamentous striæ peculiar to cancerous structure. Nevertheless, I am of opinion, that had the operation not been had recourse to, the disease would in all likelihood soon have become malignant, and proved fatal.

Lumbar Abscess opening into Rectum, and pointing behind Trochanter.

THE subject was a delicate boy, 14 years of age, admitted 16th June, having laboured under constant pain of back during the eleven preceding months. He had been affected with diarrhœa and gripes for six weeks. Over the right hip, from trochanter backwards, there was a painful fluctuating swelling, 4 inches in diameter, which he first noticed three weeks before admission. Pulse 110, weak.

By the use of the chalk mixture, with opiates, and a succession of blisters to the back and hip, he got considerably better. The pain of the hip had wholly subsided, the swelling was much less, and for the space of a fortnight he had seldom more than one stool daily. The bowel complaint recurred on the 22d July, with tormina and tenesmus; the swelling behind trochanter suddenly disappeared, he became hectic, gradually sunk, and died on the 15th of August.

Inspection.—There was a large thickened cyst, about half filled with purulent matter, extending from the lower part of sacrum to the upper edge of the last lumbar vertebra. From its middle part, a sinus extended laterally through ischiatic notch to a large empty sac behind trochanter. It communicated anteriorly with the rectum by a fistulous opening of the size of a crow quill. The mucous coat of the rectum and lower part of ilium was of a deep red colour, and covered with numerous minute ulcers. The inferior lumbar vertebra and upper portion of sacrum were carious, and their intervertebral cartilage destroyed.

WORCESTER INFIRMARY.

Case of Ulceration of the Duodenum, attended with Vomiting and Constipation. By CHAS. HASTINGS, M.D.*

H. W. aged 30, was received into the Wor-

* This case, as well as those of Dr. Baron, in our number of the 6th June, are taken from the Midland Reporter.

cester Infirmary on the 10th of March, 1813. This woman had for two months been affected with costiveness and occasional vomiting; the bowels had not moved for nine days previous to admission. She had likewise, for the same space of time, complained of pain in the hypochondriac regions, and in the back, between the shoulders. She described the pain as having been very severe, so much so as to make her groan heavily. She also mentioned that she had a teasing cough, which produced pain in the epigastric and right hypochondriac regions, but her breathing was not difficult. By a dose of castor oil the bowels moved freely; but the symptoms were not relieved.

The bowels again became inactive; vomiting of nearly pure bile, in considerable quantity, generally occurred once in 24 hours. There was great soreness to the touch in the epigastrium and right hypochondrium. The pain was severe, more particularly in the back between the shoulders, in the epigastric region, and below the margin of the ribs on the right side. Pulse 96, hard. The skin, about nine days after she was admitted, became yellow; she emaciated; the countenance always expressed much suffering. She generally appeared to obtain some ease by bending her body over her knees. Remedies gave no relief. She died on the 31st.

On inspection of the body, there was no disease discovered in the cavity of the thorax.

Abdomen.—The liver was healthy; the stomach also healthy. In the duodenum, beyond the part into which the biliary duct entered, an ulcer larger than a crown piece was found. The ulcer was of a cancerous kind; the edges of it were very ragged and everted. The surface of the ulcer was very irregular, from fungous excrescences. The coats of the intestine around the ulcerated part were much thickened. The other intestines were healthy.

There was no other mark of disease in the abdomen.

NOTICES.

We are sorry to find that the cases of Puerperal Fever inserted in our last, were not intended for publication. They were sent for the perusal of a friend, and the gentleman who transmitted them requests us to free him from the responsibility of their having been made public.

ΝΟΣΟΚΟΜΟΣ in our next. A reference to vol. i. p. 508, will prove that he is not unknown to us. Why does he not write in his own name?

Mr. Baker denies the statement of Mr. Clapperton with regard to the case of Abigail Kenny. We cannot insert any more letters on the subject.

THE LONDON MEDICAL GAZETTE,

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SATURDAY, JULY 4, 1829.

ON THE
INFLAMMATORY AFFECTIONS OF
THE BRAIN AND ITS MEMBRANES.

*Being the Substance of the Croonian Lectures,
delivered before the Royal College of Physicians,
in May 1829,*

BY FRANCIS HAWKINS, M.D.

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[Continued from page 102.]

LECTURE II.

Arachnitis.

IN the preceding lecture, after noticing the ambiguity of cerebral symptoms in general, we considered those in particular which belong to inflammation of the dura mater.

We now proceed to another division of our subject, which, in a medical point of view, is highly deserving of attention; for, of the morbid affections to which the cerebral system is subject, inflammation of the arachnoid and pia mater is by no means the least important: and such we might readily expect would be the case, both from the texture of these parts and from the situation which they occupy; for, if the affections of serous membranes in general, if pleurisy, if peritonitis, produce constitutional symptoms, severe in their character and dangerous in their tendency, it could hardly be expected that inflammation of the serous membrane of the brain would be less influential on the constitution, or less important to life. It would be well if the facility of recognizing the disorder in question were at all commensurate with its severity and importance: but this, unfortunately, is not the case, for

reasons before alluded to—namely, from the doubtful nature of the early symptoms of cerebral affections, and from the universal sympathies awakened by them. Whence it happens that inflammation of the arachnoid, the most important of serous inflammations, is the one least easy to recognize in practice.

It is remarkable that not merely the pathology, but also the anatomical and physiological relations of the arachnoid membrane are more involved in doubt than those of any similar texture. There are doubts respecting the form in which it is disposed; respecting the functions which it performs, and the morbid alterations to which it is subject. In this country it is considered that the author of the Treatise on the Membranes indulged a spirit of generalization too far, in his description of the arachnoid: he was too much determined to reduce this membrane to a strict accordance, in all points, with the characters which he attributes to this class of serous membranes. By analogy, he states, he was led to suspect that the ventricles of the brain must be lined by a continuous fold of the arachnoid. Accordingly he found, as he asserts, that the same membrane which is reflected over the convexity of the brain is introduced by an oval opening formed in that part of the pia mater which goes to constitute the choroid plexus, under the venæ galeni, into the third ventricle. But many expert anatomists deny the very existence of that communication which Bichat pretended to demonstrate. Nevertheless, the French writers upon this part of pathology implicitly follow the description of Bichat, and, with an easy confidence and positive

air, to which the pathologists of that nation are somewhat prone, proceed to reason upon it as if it were wholly proved. But further, if the functions of exhalation and absorption were carried on by the arachnoid, in precisely the same manner as by the serous membranes of the other cavities of the body, the fluid exhaled would be found only on its interior surface; and the serous effusions which take place within the cranium would be contained only within the cavity of the arachnoid, instead of being found, as in fact they are, to take place chiefly *between* the arachnoid and pia mater. The truth is, that, in cases of inflammation, the vessels of the pia mater must be the chief agents, both in the effusion of serum and the formation of pus. To the same class even those vessels may be referred which, from their close adhesion to the arachnoid, in consequence of inflammation, are sometimes supposed to belong to that membrane: but the vessels that really belong to the arachnoid are invisible to the eye, although, from the circumstance of its becoming thickened, it must be admitted to be provided with vessels. Since, however, the arachnoid and pia mater must necessarily be inflamed together, and since a portion of the *latter* is certainly contained within the ventricles, the points which have been alluded to are subjects rather of speculative than of practical importance.

To designate the simultaneous inflammation of both these membranes, the term *arachnitis* may be thought insufficient, and that of *meningitis* may possibly be preferred. But since the latter is a term as much too comprehensive in its signification as the former is too confined, and since it might be supposed to include the distinct disorder of inflammation of the dura mater, I am induced to prefer the term *arachnitis*, to signify the inflammation of both the interior membranes.

The effects of inflammation are not so visible in the arachnoid and pia mater as in many other parts of the body. Through the want of vessels in one of these membranes, and through the great number which naturally belong to the other, it is rendered equally difficult to recognize an increase of vascularity in both. The redness which is sometimes attributed to the arachnoid, belongs, in fact, more frequently to the pia mater, which is seen in an injected state be-

neath it. In very acute cases, however, the arachnoid is itself capable of acquiring a slightly rosy tint, which does not yield to compression, or to washing; and this may be confined to particular spots, or may extend over the whole membrane. But the effects of inflammation most commonly observed in the arachnoid, are an increase of density and loss of its transparency. The thickening is generally confined to particular spots, and sometimes the membrane becomes milky and opaque, without being apparently thickened. The pus which is formed on the surface of the arachnoid is generally small in quantity, and not collected into one mass, but spread in a thin layer over a considerable extent; and the parts on which it is most frequently found are the convexity of one or both hemispheres, as likewise on some parts of the base of the brain, especially at the decussation of the optic nerves, and on the pons varolii. Suppuration between the membranes of the brain is more common than the formation of coagulable lymph; but occasionally, though rarely, the arachnoid is covered with what appears to be a false membrane, or the membranes are found to adhere together, or to the brain. But the most common occurrence is the effusion of serum, which is sometimes found between the dura mater and arachnoid (that is, within the cavity of the latter), but much more frequently between the arachnoid and pia mater. In this situation the effused fluid is often of a gelatinous consistency, and appears to be contained in cells which are formed between the net-work of the pia mater and the convolutions of the brain.

In examining the morbid appearances of these parts, it is necessary to distinguish congestion in the pia mater from inflammation; nor can we, perhaps, be certain of the existence of the latter unless we find something more than increased vascularity—namely, the products of inflammatory action. Congestion, moreover, takes place principally in the veins; it is found to give rise to coma, and even to apoplexy. We should also be aware that the arachnoid may be left thickened by *old* attacks of inflammation; we cannot, therefore, infer its recent existence from that appearance alone, unless the symptoms also of inflammation have marked the period of the attack.

To assist us to recognize inflamma-

tory affections of the head, and to enable us, in some cases, to foresee their occurrence, attention should be paid to the *causes* which produce them. It has been calculated that, out of a very large number of cases of arachnitis which have occurred in the hospitals of Paris, more than one-third have been owing to blows on the head. *External violence*, therefore, is the most frequent cause of arachnitis; but this cause produces also other affections, which are complicated with it. Thus the dura mater is always simultaneously inflamed; and when arachnitis is thus caused by injuries of the head, it has always a tendency to proceed to suppuration.

The cause next in frequency to external violence, is the *metastasis* of some other affection, under which it is meant to include the cases which arise from the suppression of a discharge. From this cause, thus understood, one twelfth of the cases in the calculation before alluded to were found to take their origin. The disorders in the course of which inflammation is most liable to be transferred to the arachnoid, are fever, erysipelas, scarlatina, measles, hooping-cough, and rheumatism. With regard to the transference of inflammation from the chest, or abdomen, it is well known that, if the serous membrane of one cavity be inflamed, the other membranes of the same class have a tendency to be inflamed likewise. Dr. Abercrombie remarks, that after scarlatina, especially when followed by anasarca, the symptoms of arachnitis have sometimes supervened, and have been mistaken for the effects of anasarcaous effusion; and thus an affection entirely inflammatory in its nature has been overlooked and neglected. The discharges, on the suppression of which arachnitis is most apt to be excited, are the menstrual and hemorrhoidal flux, and the secretions of the breast and kidneys. It may succeed also the stoppage of a purulent discharge; but it is to be observed, that suppuration will sometimes cease in a wound in consequence of some cerebral affection, of which its cessation is an effect, and not the cause. In cases of a complete suspension of the secretion of urine, the patient usually dies comatose (as it is said, on the third day), and the ventricles of the brain are found distended with fluid.

To the influence of *depressing passions*, a larger number of cases of arachnitis might appear to be attributable than even to the foregoing cause, were it not often doubtful whether the depression of spirits should not rather be considered as arising from, than as producing the morbid affection in the head.

Exposure to the sun's rays, or *insolation*, as it is called, is said to be a frequent cause of arachnitis: but, of the cases observed in the hospitals of Paris, a very small number were found to be owing to this cause. It is, however, to be expected that a smaller proportion of cases thus produced will be met with in the hospitals of an European capital than are likely to occur in the country, and in a warmer climate. When inflammation has arisen from this cause, it sometimes produces the symptoms of coma and paralysis, and sometimes a state of delirium bordering upon mania. As might be anticipated, therefore, from this diversity in the symptoms, it is found, upon inspection, that sometimes the substance of the brain is inflamed, and sometimes the membranes. Pinel has related the case of a reaper, in whom the sun's heat produced acute inflammation of the arachnoid, evinced by phrensy and convulsions, and which proved fatal in the course of three days.—(*Nosographie Philosophique*, t. ii. p. 402). Dr. Abercrombie, on the other hand, has given a case in which, from the same cause, the substance of the brain was inflamed, and coma was the prominent symptom.

Organic affections of the brain itself, such as tubercles and ossifications, may be looked upon as causes of arachnitis; since, by mechanical irritation, they are capable of exciting inflammation in the membranes. To the same division of causes may be referred disease in the bones of the cranium, and the inflammation of the dura mater, which it excites, and which is subsequently extended to the arachnoid.

In the calculations which have been referred to, that were made at Paris, the proportion of cases of arachnitis attributed to the influence of *spirituous liquors*, is by no means so large as, judging from those which have fallen under my own observation, I should have been led to expect. In France, where the vice of drunkenness is less common than in

England, such calculations may possibly have been correct: but in this country I should be inclined to believe that the abuse of spirits is the most common of all the causes of arachnitis, at least of the chronic form of that disorder. Thickening of the arachnoid is found, in numerous instances, in conjunction with induration of the liver, and other undoubted effects of ardent spirits. Not long since, I was present, with my friend Dr. Macmichael, at the examination of a patient who had been subject to epileptic seizures, and to other symptoms, which had appeared to be excited and aggravated by the habitual use of spirits. The liver was enlarged and indurated, and every where of a light saffron colour; and the arachnoid was also found to be universally thickened. Such cases are by no means uncommon; but I mention this on account of its immediate connexion with the alteration of structure produced by spirits in the liver.

In the foregoing enumeration have been included almost all the known causes of the excitement of arachnitis; but, after each had its proper share of care assigned to it, there still remained in the tables calculated at Paris, out of more than one hundred cases, nearly half which had appeared to arise spontaneously, or to which, at least, no evident cause could be assigned. In concluding what I have to remark on the causes of arachnitis, it may be observed, that, whatever may have been its exciting cause, the symptoms of the case are not on that account subject to much variation.

Other calculations have been made from the tables already alluded to, which are curious in themselves, and not the less worthy of credit because they do not appear to have been formed in support of any particular theory.

Thus it was found that the number of *men* affected with arachnitis was, to that of the *women*, in the proportion of more than three to one.

In *children*, arachnitis was found to be less common than in *adults*; whilst, after the age of sixty, its occurrence was still more rare. Of course it was not intended to include in this calculation cases of hydrocephalus in infants, arising from other causes besides inflammation of the arachnoid. The portion of the arachnoid inflamed in children was found to be almost always at

the base of the brain, whilst, in adults, that which covers the surface of the hemispheres was much more commonly affected.

The common *duration* of acute arachnitis was found to be from seven to eighteen days, though some cases terminated fatally as early as the third or fourth day; few passed the twenty-fifth, and three cases only, out of more than one hundred, were found to extend beyond the thirtieth day.

With respect to the *symptoms* and general character of arachnitis, it has been already observed that it differs from inflammation of the substance of the brain somewhat in the same manner that membranous and parenchymatous inflammation differ in other organs of the body. The constitutional symptoms, the accompanying fever excited by arachnitis, are much more strongly marked than those which attend the commencement of inflammation of the brain itself. Irritation is the character of the one—oppression that of the other. Delirium and convulsions are the prominent symptoms of arachnitis; coma, rigidity, and palsy, are the distinguishing marks of cerebral inflammation, and of the disorganization to which it gives rise.

For the sake of convenience in describing its symptoms, the usual course of acute arachnitis has been divided into three stages. The first is characterized by an increase of sensibility, and the third by its total destruction; the second stage by such an increase of the symptoms of the first as to lead to that confusion of all the symptoms which characterizes the third.

Accordingly, in the first stage, or that of increased sensibility, head ache is always present, with some degree of intolerance of light; sometimes the intellectual powers appear to be exalted, and the conceptions unusually vivid; at other times there appears to be such a rapidity of ideas as to lead to a slight confusion. The digestive organs become affected, the bowels constipated, and the stomach irritable; and vomiting is common, especially in children, a reason for which will be presently stated.

In the second stage the symptoms of irritation are carried to the greatest extent, and affect especially the intellectual and locomotive functions. The confusion of thought, therefore, amounts now to complete delirium, and the limbs

are frequently convulsed. The organs of sense, particularly the eye and the ear, are in various ways affected and disturbed. In this stage, also, the outward signs of increased determination of blood to the head, such as flushing of the face and redness of the eyes, are most apparent.

The third stage is nearly the same as the concluding period of all disorders of the brain, all marks of distinction being lost in the abolition of sense and motion.

It is not pretended that these periods are always clearly marked, or accurately divided; one or more of them may be wanting, or one may be shaded into another, or all may be obscured, according to the intensity and duration of the disorder, or as it is complicated with other affections. Still it must be admitted that this description is possessed of general truth, and that such is the course which the disorder is usually found to pursue, through the states of irritation, reaction, and collapse.

In those cases which terminate favourably, having stopped short of their last and fatal stage, there often remains during a state of convalescence a degree of head-ache, which appears to be of a nervous character, and may last for a very considerable time. There is sometimes, also, an increased frequency of the pulse. When the intellectual functions have been much disturbed, it is long before the memory returns to its accustomed state, and can be exercised again with regularity and freedom.

Of the symptoms which have been attributed to arachnitis, *pain in the head* is the most certain and constant of all; for the arachnoid, like other textures which in their natural state possess little or no sensibility, becomes always acutely sensible when it is inflamed. But even in cases of partial inflammation, the pain appears to be general, and extends over the whole head; it does not, therefore, indicate the seat of the attack with so much certainty as the dull and less constant pain which is indicative of partial encephalitis. The pain is felt chiefly in the early stage, because afterwards the perception of it is rendered obtuse by the progress of the disorder; and, for the same reason, should the disorder be subsequently mitigated, the sense of pain which had appeared to be no longer felt is sometimes found to return.

Increased *sensibility of the eyes to the stimulus of light* is an important sign, as affording strong evidence of the existence of arachnitis. Indeed any affections of the organs of sense occurring early, assist the diagnosis, and are always deserving of attention. Unfortunately, what may be called the pathology of the iris is still involved in inextricable confusion. If contraction be its active state, and dilatation that in which it is relaxed, it would seem reasonable to suppose that a contracted pupil should indicate irritation, and a dilated pupil pressure on the brain; and, in fact, dilatation of the pupils is for the most part found in connexion with serous effusions, especially into the ventricles. Hence it is most common when the arachnoid covering the base of the brain is inflamed, because then effusion into the ventricles most frequently takes place. But the pupils of the eyes are sometimes permanently dilated when no effusion can be found either on the surface of the brain, or in the ventricles. On this sign, therefore, as an indication of effusion, we must not rely with too much confidence. And nearly the same may be said of strabismus. Even in cases of depression of bone, or extravasation of blood, the influence which pressure on the brain has over the motions of the iris is subject to much variation. The iris may be insensible to light, whilst the general sensibility is unimpaired; or, whilst the loss of general sensibility is complete, the pupils may continue to contract and dilate in their ordinary manner. Perhaps the only general rule that can be laid down may be stated as follows: that when pressure is made upon the brain, the iris in one or both eyes is no longer obedient to the impressions of light received upon the retina, but remains either permanently dilated or contracted, or contracts and dilates in an irregular manner. Rotation of the ball of the eye has been thought to indicate suppuration at the base of the brain; but I am not aware that this conclusion has been verified by a sufficient number of well-observed facts.

Sickness and vomiting have been mentioned as symptoms of the first stage of arachnitis, and they appear to signify that the arachnoid covering the base of the brain is inflamed. Hence vomiting is most common in children,

in whom that part of the arachnoid is the most frequent seat of disease. Is it not possible, indeed highly probable, that this symptom may arise from irritation of the eighth pair of nerves? In children, too, there is generally at first more of heaviness and confusion than of excitement; and this also is found to be characteristic of arachnitis of the base; and in proportion to the degree of confusion is the derangement usually of the digestive organs.

The *delirium*, or complete disturbance of the intellectual functions, which attends the second stage of arachnitis, is the characteristic mark of inflammation of that portion of the arachnoid which covers the convexity of the hemispheres: it must be caused by an extension of inflammation or of irritation to the substance of the brain itself, and this pathological phenomenon adds great probability to the notion, in support of which many physiological arguments might be adduced, that the seat of the intellectual functions is in the cineritious surface of the convolutions of the brain.

The *convulsions* which attend arachnitis are slight at first, and affect principally the arms and the face; but they afterwards become *general*, and are accompanied in most instances with a rigid state of the muscles, particularly of those of the neck. Nor is this rigidity succeeded by the flaccid state which follows the partial convulsions that occur in encephalitis. In fact, paralysis is much more frequently caused by inflammation or injury of the substance of the brain than by arachnitis.

There are some who go so far as to say that there can be no paralysis without injury or breach of continuity of the medullary fibre. Nevertheless, in cases of arachnitis attended with suppuration, or with effusion of serum to a great extent on one side of the brain, hemiplegia does sometimes take place on the opposite side. But to produce this effect, the serum must be collected in one of the ventricles; for serosity alone on the surface of the hemisphere will not give rise to hemiplegia, though suppuration may; probably, because the serum cannot well be confined so as to produce sufficient pressure. Hence hemiplegia occurs most frequently when the inflammation has been produced by external injury, for such cases, it has been before said, are prone to run on

to suppuration; but not even then does it very often happen, for, as Mr. Brodie has observed, hemiplegia is more frequently produced by apoplectic extravasations of blood, than by inflammation of the membranes.

The *coma* which has been ascribed to the last stage of arachnitis is nothing more than that annihilation of the functions of animal life which precedes death in almost all disorders of the brain. It by no means certainly indicates the presence either of effusion or of suppuration, but may be caused simply by that state of utter exhaustion which is commonly, though somewhat absurdly, perhaps, termed a state of collapse. It is thought to occur most frequently when the inflammation is situated at the base of the brain.

[To be continued.]

FATAL CASE OF ACUTE GLANDERS IN THE HUMAN SUBJECT.

To the Editor of the London Medical Gazette.

SIR,

GLANDERS, until lately, was generally considered, I believe, a disease exclusively belonging to the horse, the ass, and the mule; but within the last few years several cases have been recorded which unquestionably shew the facility with which it may be communicated to the human subject, by the contact of morbid matter (from either of those animals) with the surface of incised or lacerated wounds: evinced not only by the subsequent inflamed state of the lymphatics, distinctly traced from the part originally inoculated, terminating rapidly in ulceration similar to farcy; but also by the matter taken therefrom possessing a most active power of reproducing this disease in its acute and genuine form. I am not, however, yet acquainted with any authenticated case having hitherto occurred where this truly formidable disease has been communicated to man by other means; either by cutaneous absorption, by effluvium, or by the incautious application of glandered matter to the nasal linings in picking, scratching, or blowing that organ; and should it be admitted that there is even a possibility of introducing this direful malady into the

human system by any one of these means, or by a combination of the whole, then the following singularly untoward case may be at least elucidated, if not clearly and fully explained.

CASE.—Corporal John Wells, aged 38, a tall, well-formed, florid-complexioned, healthy-looking man, originally a labourer, and had been upwards of 19 years in the corps, during the whole of which lengthened period he “was never once in the doctor’s list,” always enjoying the best possible health, until the night of the 16th of April past, when he was suddenly awoke from an unrefreshing sleep by rigors, head-ache, and slight irritability of stomach; all of which continued unabated when admitted into the hospital next morning—while he complained in addition of severe continued pains and stiffness in all his large joints, which became excessively aggravated on the slightest motion.

I am just informed, “these are the constant precursors when a combination of severe *acute* glanders and farcy first appear in the horse; and in all cases thus ushered in death *speedily* and inevitably follows.”

He laboured likewise under great depression of spirits, restlessness, and a general disturbance of all his functions, which he could not possibly refer to any particular cause; but on subsequent inquiry it appeared that he had had sole charge of a glandered horse for some time, which had been destroyed on the very evening of his attack; and that he had skinned him, and exerted himself a good deal in cutting-up and burying the carcass. But these circumstances did not then create the least suspicion, and his complaint was considered a very severe case of acute rheumatism, and treated as such.

However, on the morning of the 19th, two days after admission, finding that the severity of his pains increased, under the most active means, and that his constitution was no longer able to bear a continuance of them, Dr. Home and myself became much alarmed, even at this early stage of the disease, in observing its unconquerable virulence and novelty of appearance, forming thereon, in consequence, a very unfavourable prognostic.

From this period the constant and general pain, night and day, became excessive and violent to a degree; but

particularly over the left shoulder, which, on examination, shewed the scapula slightly tumefied, although not inflamed; but being above the temperature of health, leeches were consequently applied over its entire surface, and it bled profusely for some hours after, without affording the least relief; it shortly after became hard, ecchy-mosed, and insensible to the touch.

The severity of his sufferings continued unabated, and on the morning of the 24th (seven days after admission), the tumor over the scapula had assumed a dark livid colour, and attained a considerable size, resembling in a strong degree the shoulders of a man recently and severely punished.

Similar tumefactions, but more circumscribed, were now observed on the legs, thighs, arms, and sacrum; and one of considerable magnitude over the left temple, which had already distorted the entire face—the eye being apparently diminished and humory, the lids tumefied, the inferior one with a prominent doubling in it; the conjunctiva pale and infiltrated, as well as the membrana nictitans and caruncula lachrymalis. The skin and cellular membrane of this tumor, together with those on the extremities, became like that on the scapula—hard, insensible to the touch, and of a dark chocolate colour—convincing us that the application of leeches to the original one was not instrumental in the production of the appearance—as we had then supposed. The right nostril was likewise contracted, and gummed with an inspissated discharge; and he complained of constriction of the throat, with difficulty in swallowing cold liquors, but not those previously warmed. On examination, the posterior fauces were found much inflamed, and nearly of the same purple hue as the tumors on the surface: the whole of which observed regular gradations from their commencement; first shewing themselves not simultaneously, but in succession, by a slight discoloured puffiness of the skin and cellular membrane, generally nearest to the bone. They were next observed, after a lapse of twelve or fifteen hours, suffused over their entire surface, with a deep vermilion blush, which then changed rapidly into a dark brown, the integuments becoming thick and callous, with fissures, or superficial cracks, from which exuded a thin,

acid, corrosive sanies. These formed their characteristic appearances, without any very material deviation, or producing the slightest mitigation of suffering throughout, which had now become so excruciating as to baffle every effort of art to procure either sleep or rest: not even whilst in the warm bath has he had a moment's respite from pain.

His thirst, from the beginning, had been great, with a foul, parched tongue; his pulse varying from 88 to 96, and full, but easily compressed; and the blood abstracted at the commencement of this disease appeared much attenuated, buffed, and deprived of the coagulating principle. His bowels (constantly attended to) were easily kept free, and his excretions, both urinary and alvine, were always natural in every respect; shewing the alimentary canal to be perfectly healthy.

In this state he advanced into the morning of the 28th, his eleventh day under treatment, when several distinct warty pustules, considerably raised above the surface of the skin, were first observed on different parts of the body, very much resembling yaws, but particularly numerous and large over the right side of the neck and shoulders, and on the inside of the arms and thighs.

Several of the tumors already described, but particularly the one over the shoulders, appeared now to be running rapidly into gangrene; which had not been in the slightest degree arrested by the copious exhibition of tonics and antiseptics, and the powers of nature being at length almost exhausted, his pulse scarcely perceptible, his countenance frightfully haggard and livid, his entire surface bathed in a cold clammy sweat, and of a pale leaden hue, we expected every moment to be his last. He, however, held out, in a partial state of somnolency and a low muttering delirium, until the morning of the 30th, when death released him from his misery, having been twelve days under treatment in the hospital.

Post mortem Examination.—Eighteen hours after death, the body was inspected by Assistant-Surgeon Dr. Home, and myself, and presented the following appearances:—

The entire surface exhibited a most unsightly deformity, with extreme emaciation, being nearly covered by black gangrenous tumors of various sizes,

each surrounded by numerous small vesications, about the size of peas, which, with those over the neck, shoulder, arms, and thighs, at first sight resembled the yaw pustule, but on cutting into them they were found to be merely elevations of the cuticle, filled with a dark violet-coloured inspissated lymph.

A strong suspicion having been recently entertained, that the causes and effects of this disease had their origin in glanders, it was considered essential, in the first instance, to have the absorbents of each arm minutely examined, to their termination in the axillary glands, in order fully to ascertain whether it might have been communicated, through their medium, to the system generally.

These vessels, however, as well as the glands, were found in their natural state; nor was there the slightest appearance of either absorbent, glandular, or cutaneous inflammation; nor any recent cicatrices, chapped or scratched fingers, or, in short, the slightest breach of integument or abrasion of skin, by which absorption of morbid matter could have been facilitated into the system, any where discoverable.

The head was next examined; and on removing the scalp in the usual manner from the cranium, and thereby dividing the tumor already specified, we observed, immediately over the left superciliary ridge, a cluster of tuberculated bodies, of various sizes, imbedded in a lamina of the cellular tissue exterior to the pericranium.

At this stage of the dissection, the presence of our highly-talented and much esteemed veterinary surgeon, Mr. Woodman, was solicited; and on his arrival, he unhesitatingly recognized “a strong resemblance between *these* and *those* usually found in the nasal linings of glandered horses after death.”

The skull-cap was now removed, and discovered the brain much more pale and soft than ordinary, with rather a larger proportion of fluid in the ventricles. But, on removing with the saw that portion of the cranium situated between the orbits, the Schniederian membrane lining the frontal sinuses and passages into the interior æthmoid cells, appeared throughout not only pale, thickened, and infiltrated, but in the right frontal sinus was another cluster

of what Mr. Woodman considered to be "well-defined ulcerated tubercles, and exactly similar in appearance to what we have in the membrane lining the frontal sinuses and other cavities of the head in *acute* glanders in the horse." Although in this case of ours, the ossæ spongiosæ were free from their presence.

The posterior fauces were next examined, and found highly inflamed, of a dark purple colour; and on the surface of the right tonsil there were four or five ulcerated patches of a similar character with the preceding. But neither the thoracic nor abdominal viscera presented any vestige of this formidable disease, all of which appeared perfectly sound, except that the tissues of the heart might be considered rather more pale and flabby than usual.

We now resumed the examination of the trunk, first inspecting a large, hard, cancerlike tumor, spreading backward over the scapular region, and downwards by the serratus and latissimus dorsi muscles, the most prominent part having cracked or separated previous to death, from which exuded a thin, highly-fetid, ichorous sanies. And on cutting through this disorganized mass, down to the bone, the muscles appeared perfectly decomposed, and of a dark, liver colour, (exhaling a peculiarly fetid odour), with points of purulent matter, as it were, infiltrated every where through its entire substance, resembling much a hepatized or tuberculated lung. And on removing the whole of this diseased mass from the bone, the scapula was observed nearly covered by a cluster of grey circular tubercles, the whole composed of fine cellular tissues, enclosed in small cysts, and firmly attached to the periosteum, differing only in this respect from those found on the pericranium.

The other tumors on the sacrum and extremities were all separately examined, and exhibited precisely the same character and appearance with those already described—each covering a crop of tubercles, adhering to the periosteum underneath, and proportionate in size and consistency to the extent and duration of the tumor.

The muscles generally, even those the most remote from the tumors, appeared blanched and flabby, the fibres softened, and the cellular membrane infiltrated with a yellow serosity. In short, the

entire frame was here more or less contaminated.

Having now faithfully, and, I trust, clearly and concisely, detailed the most prominent features in the primary appearances, the progress, and the termination of this violent and extraordinary malady, I shall refrain from offering any opinion of my own, but leave it entirely to the reader to form his own conclusions, from the foregoing details.

ANDREW BROWN,

Surgeon, 2d Dragoon Guards.

Caher Barracks, 31st May, 1829.

ON CELLULAR EXOSTOSIS, &c.

BY GEORGE GULLIVER,

Member of the Royal College of Surgeons, Assistant-Surgeon to the Forces, &c.

IN investigating the organic alterations of the osseous tissue, we have been too much accustomed to associate and identify them with those of soft parts, without considering the difference of structure, and the consequent modifications of vital properties. We seem to have been led into this error by the influence of early impressions, which adhere to us with the greater tenacity because they have so long occupied a place in our minds as to be at length tacitly acknowledged as facts, without that wholesome suspicion with which we are wont to examine new doctrines. There are certainly many circumstances common to the diseases of bones and soft parts; but a minute attention to the phenomena of the particular affections of the former will shew that the resemblance is soon lost, and that our knowledge of the pathology of the latter affords but few analogical applications to that of the osseous system. "It is in the bones themselves," says Boyer, "that the diseases of bones must be studied."

We have already seen that osteo-sarcoma possesses no analogy to exostosis; in which, as in the natural process, the osseous production is preceded by cartilaginous formation. I proceed to the consideration of cellular exostosis, as being the affection with which osteo-sarcoma is most commonly confounded.

The subjects of cellular exostosis are by no means so remarkably debilitated

and unhealthy in appearance as those labouring under osteo-sarcoma. The patient often refers the cause of the affection to some local injury; sometimes the pains are described as being very acute and violent; but other cases occur where the disease is principally inconvenient from impeding, by its growth, the motions of the limb, the patient never having suffered very acutely. The affection, like osteo-sarcoma, originates in the medullary web, and at first apparently distends the walls of the bone, when cartilaginous matter is formed, which is soon abundantly pervaded by osseous plates and spiculæ. The dilated parietes of the bone are rapidly removed by absorption, and the diseased mass extends in every direction, but is generally observed to implicate a part only of the circumference of the walls of the affected bone. In this particular cellular exostosis differs from spina ventosa, as I shall have occasion to remark when treating of that curious disease. The capsule of the morbid growth is generally formed by the periosteum much thickened and indurated, and sometimes a partial crust of bony matter is deposited on the surface of the tumor. The swellings gradually increase in size, become irregularly tuberculated on the surface, and often acquire prodigious magnitude. There is a preparation of this kind in the excellent pathological museum at St. Bartholomew's hospital. The disease is throughout marked by a much slower course than that which characterizes osteo-sarcoma. The neighbouring soft parts are not soon affected, and the articular cartilage is the last structure implicated. Many turgid veins meander over the surface of the swelling, but it is surprising to observe to what an enormous size it sometimes attains without even producing discoloration of the investing integuments. Ulceration, however, at length supervenes; there is profuse discharge of ill-conditioned purulent matter and sanies, and the substance of the tumor is traversed by fistulous ulcers, or becomes one hideous fœtid sore. The morbid mass frequently extends to the extremity of a long bone, or even projects very considerably beyond its articular surface, without involving the cartilage. This circumstance accounts for the motions of the limb being preserved to so late a period of the disease.

If a section be made of one of the tumors, it evidently indicates a firm gristly texture, intermingled with a large proportion of osseous matter. A knife is with difficulty carried through the mass, the saw being often required to complete its division. The cut surface frequently presents little excavations, filled with sanies or gelatinous substance, interspersed here and there with clots of blood and deposits of carious matter, and the adventitious mass is seen to spring from the very centre of the cancellous structure of the bone.

There are numerous splendid specimens of the disease preserved in the collection at St. Bartholomew's hospital. In one instance the morbid production is intersected in every direction by many white bands, presenting an appearance not unlike scirrhus. In another the tumor is of vast magnitude, and seems to be made up entirely of cartilage, with bony matter; and in the cancellous structure, near the basis of the swelling, is a well defined deposit of a whitish, and apparently cartilaginous substance, which is just protruding through the walls of the bone. Although there are several specimens in which the diseased growth extends as far as, or even beyond the extremity of the bone, I do not recollect a single example of disorganization of the cartilage. The bony structure forms a strong skeleton for the softer substance of the tumor, as may be seen by the numerous beautiful macerated preparations in our museums; and the osseous matter is apparently not derived from the affected bone, but is generated in the substance of the adventitious cartilaginous formation.

This malady seems to be indentical with those organic lesions of bone described in books of surgery under the various appellations of cellular, eraggy, and laminated exostosis. The case of "osteosarcoma," narrated by Mr. Syme in the 30th volume of the Edinburgh Medical and Surgical Journal, I consider to pertain to this species; as also the cases described by Sir A. Cooper, under the denomination of cartilaginous exostosis of the medullary membrane. Although Boyer's account of osteo-sarcoma evinces much research, yet it appears to me that he has included some forms of that affection with his description of exostosis. The case of the weaver, related by Severinus, is manifestly one of cellular exostosis;

and I regard the history of the disease which occurred in the humerus of Alexander Macdonald, so admirably told by Mr. John Bell, as another well marked example.

It is, however, needless to multiply the synonyms of a disease so well defined by its structure, and by the phenomena displayed in its progress; but it may not be amiss to recapitulate some points wherein cellular exostosis differs from osteo-sarcoma. The former is not necessarily of a malignant nature, although it frequently causes exhaustion of the vital powers, and the affection is much slower and less destructive in its course than osteo-sarcoma. It has already been remarked in what particular the latter bears no analogy to any form of exostosis, but the subject now under consideration is truly allied to that affection, as cartilaginous deposit precedes the formation of bony matter. The firm and unyielding nature of the tumor in cellular exostosis affords another distinctive mark; and this disease is moreover seldom accompanied with the profuse hæmorrhage which so often takes place in the ulcerative stage of osteo-sarcoma.

There are two other forms of exostosis to which the appellation of osteo-sarcoma is often ascribed, but as they are situated between the periosteum and external shell of the bone, there can be no difficulty in distinguishing them from the species just described, and from osteo-sarcoma. One of these periosteal exostosis, as they have been termed by Sir Astley Cooper, possesses a fungoid character, and is marked by the same tendency to ulceration, sloughing, and hæmorrhage, as osteo-sarcoma. The other is a very simple disease, is extremely slow in its progress, and although generally accompanied with more or less pain, it often produces inconvenience only by its mechanical extension.

In the first species, a whitish and tolerably firm deposit takes place between the periosteum and external surface of the bony parietes, from whence numerous irregular osseous processes shoot in a radiated manner into the adventitious substance. In the Bartholomew museum there is an example of the disease, in a dry preparation of the tibia, exhibiting fine spiculæ proceeding from the external surface of the bone,

which is very porous, and presents a light lead colour.

A section of the recent tumor offers a whitish semi-cartilaginous mass, intermingled with softer portions, which are highly vascular; the parietes of the affected bone are observed to be entire, or ulcerated from the pressure of the disease; the medullary cavity suffers no change, save that which results in the latter stages of the disorder from contiguous irritation.

The second species is a very common affection, and often acquires vast magnitude. It has been repeatedly observed in the legs of old horses. The tumor is composed of a very firm cartilaginous structure, with a large proportion of osseous matter; it admits with difficulty of injection, and its incised surface is white and smooth. The quantity of bone which enters into the structure of the tumor is much greater than in the preceding species; and most of the osseous matter is apparently formed and deposited in the cartilaginous growth, although some plates are derived from the parent bone, the walls of which are sometimes thickened and ulcerated. The medullary cavity is unaltered, unless in the last stage of the disease, when the usual effects of irritation are produced.

With moderate attention, there can be no possibility of confounding these two last forms of exostosis with osteo-sarcoma, or with that variety of exostosis which originates in the very centre of the cancellous texture; for, independently of the difference of structure, the situation of the two species just described between the external lamella of the bone and periosteum affords a sufficiently distinctive mark.

I shall conclude this subject by a few remarks on spina ventosa, a disease which is as embarrassing to the surgeon as it is interesting to the pathologist.

ON THE USE AND ABUSE OF ALOES.

To the Editor of the London Medical Gazette.

SIR,

ALLOW me to request your attention to what has long appeared to me an erroneous and hurtful prejudice on the sub-

ject of the aloe spicata, or socotrine aloes. A notion prevails in the minds of many, even medical men, that the use of this substance is the chief, if not the sole cause of that troublesome and distressing complaint, the hæmorrhoids; and I have repeatedly experienced in practice a repugnance to its use so strong on this account as to deter patients from taking it when prescribed. I was willing to believe that the general usage of the profession had so discountenanced this idea, that it was not likely to be revived by any respectable authority. Yet no longer ago than the publication of Dr. Mackintosh's Elements of Pathology and Practice of Medicine, I find this cause of hæmorrhoids stated in the most pointed terms, and the employment of the medicine in that disorder severely reprobated. Now, Sir, I dare undertake to prove the general notion, and the condemnation of the remedy in the particular instance in question, equally groundless.

The aloe has from the earliest times occupied a very prominent place in the materia medica. Dr. Smith, the editor of Libthorpe's Flora Græca, says, the plant is the true *Αλοη* of Dioscorides, a fact that speaks volumes in its behalf, for it is clear that, had its virtues not been universally appreciated and acknowledged, it could not have been held in such high estimation for so long a period of time. It forms even at the present day, or it did a few years ago, the basis of no less than from twelve to eighteen compounds in the three Pharmacopœias of London, Dublin, and Edinburgh. All these compounds are much in repute, and many of them in constant daily use. Aloes form the only active ingredient in the well-known aloetic pill. They are present in the proportion of three to four in the mass of the pil. rhei. compos. a preparation, either by itself or in combination, now naturalized in England, and perhaps oftener swallowed than any other in the Pharmacopœia. The ext. colocynth. comp. in extemporaneous prescription, rivals it in popularity; but even here the aloe has the preeminence still, and the preparation might, with more propriety, be named the extr. aloes comp.

Even the Barbadoes, or common aloe, which some consider equal or superior to the spiked, is, according to Dr. Paris, the basis of the well-known nostrum,

Anderson's Pills, a compound in greater request amongst a certain class of the community than any other drug. The quantity of spiked aloes sent to London between 1799 and 1802 inclusive, that is in three years, was, according to Mr. Barrow, 341,927 lbs.; averaging, of course, a consumption or importation at least of upwards of 110,000 lbs. a year in this country. This does not include the quantity sent to other parts, or the quantity of Barbadoes aloes. I state these particulars for the purpose of shewing that the plant could not have been so long tolerated in the Pharmacopœia, nor so uniformly prescribed by medical practitioners, had its effects in inducing hæmorrhoids been what they are alleged to be. It is manifest, that not a grown-up person, of either sex, could have escaped that painful, harassing, and sometimes dangerous disease. Yet it is very far indeed from being a common one. The presumption, then, nay the certainty, is, whatever may have been surmised or propagated to the contrary, that practitioners have never been fully satisfied of any such property belonging to it; and the plain reason why they have not been so is, unless we believe them to be all fools, that the property does not exist; for if it had any foundation in truth, it is a moral impossibility that the prejudice and the practice could for such a length of time remain so decidedly opposed to each other. It would on this account, therefore, been more satisfactory had Dr. Mackintosh mentioned whether his condemnation of the drug rested on any decisive or extensive experience of his own. And even though it had, all that can be said is, that though he may have sufficient reason to discontinue and discountenance its exhibition, the great majority of his brethren have not been so unfortunate; and therefore no necessity yet exists why the reputation of this most valuable remedy should be brought into hazard.

One reason why the prejudice on this point is so extensively disseminated it is not difficult to understand. Dr. A. T. Thomson, in the London Dispensatory, article "*aloë*," says, "*they are warm, stimulating cathartics, acting chiefly on the colon and rectum, and there producing, by the extension of their stimulus to the uterine vessels, emmenagogue effects. From the warmth and stimulating properties of aloes, they are most*

useful in cases where the intestines are in a sluggish, relaxed, and insensible state, attended with a viscosity of the abdominal secretions, as in habitual costiveness of the sedentary and hypochondriacal; and by their powerful effects on the rectum they have been found very serviceable in expelling ascarides. On account of *these properties*, however, their use is *contra-indicated* in hæmorrhoidal cases, the symptoms of which they are apt to *aggravate**."

I hesitate not to pronounce a great deal of this mere gratuitous assertion, for where is the proof of their being warm and stimulating to the bowels? Did any one ever feel a dose of aloetic pills hot in the belly, either at bed-time, when they are usually taken, or through the night? Sure am I that such a sensation was never felt in my person, though I have had my trials with it, nor by any patient to whom I have given it. In cases of chorea, Dr. Hamilton used to order them to be swallowed by the half dozen four times in twenty-four hours; yet it is no where detailed in his work that the patients suffered from heat or stimulation in their bowels. That aloes act chiefly on the great intestines is fortunately true, for it is in that property where their undoubted superiority over all other cathartics mainly resides. Most other purgatives act on the upper or smaller intestines. It is the peculiar privilege of the aloes to operate on the larger and lower bowels, which it sets in motion, and unloads in a manner that no substance hitherto discovered can effect. That towards the close of the cathartic process they sometimes occasion a little griping may be admitted; but this sensation, in all probability, arises from the bringing into play the simple, natural expelling power of the bowel. A pain, if it can be called such, of a similar kind, is very often perceived in a healthy state of the bowels immediately previous to the individual having his diurnal motion, and is the call to the performance of that function. But no one fancies that it proceeds from heat or stimulation. Besides, calomel and jalap particularly gripe often far more than aloes; and wherein consists their heating and sti-

mulating qualities? It is intensely and detestably bitter and nauseous, but nausea and bitterness do not infer heat and stimulation. Quassia and ipecacuanha are nauseous and bitter, but there is no indication of their warmth and stimulus.

There is then no vestige of proof that aloes produce their effects by heating or stimulating in the ordinary sense of those terms, which by the bye is evidently the sense here meant, or that they injuriously irritate the rectum, especially its very extremity, the seat of the hæmorrhoids. That from their energetic influence on the bowels above the rectum, that bowel is called upon both as a recipient and an expulsory agent for the performance of its expulsive function, is correct enough; but then the mere *acting* of the aloes on these bowels is no reason whatever why they should stimulate or irritate them injuriously.

Heating, irritation, or stimulation, as they are commonly understood, are by no means identical with specific impression or *action*. Ipecacuanha and tartar emetic empty the stomach. Where is the evidence of their *warming* or *stimulating* properties?—No where. They produce their effects by a peculiar power, action, influence, or impression, call it what you will, which has no imaginable relation to heat or stimulation, in the sense which these words bear in common language, and which they are meant to bear by the author of the Dispensatory.

It is curious enough to observe what amounts to almost a contradiction in Dr. Thomson's account. The conditions and cases in which he says aloes are most serviceable, and in which of course they are most frequently exhibited, are precisely those in which piles are supposed to be most apt to occur, namely, in habitual costiveness and sluggish relaxed intestines. They are the cases in which necessity compels the constant use of this drug, which thus forms the permanent and only resource of every individual so afflicted. Yet no such baneful consequences ensue as those so seriously anticipated from their *warming* and *stimulating* properties, especially on the rectum. Indeed, the probability is, their operation on the rectum is often secondary, or perhaps only negative. By the time they have arrived at the termination of the intestinal tube, their

* London Dispensatory. I quote from one of the earlier editions of this work. However, a similar strain pervades the account of the plant given by Dr. Duncan in the Edinburgh Dispensatory, to which I beg to refer.

acrimony, their heat, and their stimulus, (if they possess any in relation to the surface on which they act, which I greatly doubt), must be materially exhausted. Nor is there much purgative power required now that the business is drawing to an end.

All that the rectum has to do is, to exert its expulsive powers, and drive forth from the body the dejecture, of which it is, in this instance, little else than the reservoir or depository; and this last effort of all, the simple principle of distention rousing up muscular action, can enable it to accomplish without the smallest help from any warming or stimulation by the aloes. Do acrid, long pent up, highly offensive fluids, and other *debris* dislodged and brought down by its singularly searching operation, excoriate during the evacuating process, causing rawness and soreness of the sphincter ani, already perhaps torn by the pressure and stretching of bulky, knotty, indurated fæces; or is the circulation interrupted, and the venous trunk distended and swollen from similar causes? Must the drug be blamed for this? Any other purgative would produce a similar, perhaps a worse effect; only there is not, in the whole range of the Therapeia, a single other substance that operates with the same moderate, mild, efficacious, and *certain* energy. In farther confirmation of this view, I cannot do better than transcribe Dr. Thomson's concluding and consolatory sentence, a quotation from Dr. Denman:—"Aloes," he says, "and aloetic compounds, have likewise been regarded as improper in pregnancy; but we can bear testimony to the truth of Dr. Denman's remark, that 'they are in common use among the lower class of people, because they are cheap, and conveniently given in the form of pills;' and no bad effects are observed to follow." All this too, it seems, in despite of "their *warming* and *stimulating* properties, and the extension of their *stimulus* to the uterine vessels, producing emmenagogue effects," &c. After such testimony, candidly and almost unconsciously tendered, respecting conditions of the body in which heating and stimulating means would be no less prejudicial than the hæmorrhoids, it is to be regretted that any expressions of disapproval should have found their way into a work which every

practitioner must be possessed of, and by which, therefore, prejudices, founded or unfounded, are widely propagated and long perpetuated. It is confidently to be hoped, therefore, that, in the next edition of this useful publication, the respectable author will see the propriety of reconsidering what he has said under this head.

Here, then, I might safely rest the question. It has been clearly shewn that the almost universal usage and practice of the profession is diametrically at variance with the belief that this safest and best of all purgative medicine has any share in the production of hæmorrhoids: but I beg permission to add a very few more observations.

On due investigation, I believe it will be found that the whole doctrine of those who object to the use of aloes, on the grounds already stated, proceeds upon a complete, though very common, fallacy—namely, that of assigning as a cause what is nothing but an effect.

Hæmorrhoids are supposed to be a disease of constipated habits, or of occasional indolent, inactive states of the bowels. This may be admitted, though with some little limitation. The means of preventing or counteracting this condition is the frequent use of laxatives; and it so happens that of these laxatives the aloe, in almost every instance, forms the principal and active ingredient. The purgative, then, that is, the obvious and operative agent for removing this state which is thought to occasion the hæmorrhoids, is set down as the cause of the disorder, while the constipation, or the disordered state of the constitution, or probably some accidental circumstance which is the real and original cause of the piles, and the only reason why the purgative is administered, is entirely lost sight of. Surely, even looking upon the affection as a local one, if we duly consider the absorption of liquid fæces in a costive state of bowels, and the accumulation, hardening, and pressure on the rectum by what is left, straining its folds, and obstructing the free circulation of its blood, we perceive a much more easy, simple, and rational mode of accounting for the disease, than by imputing it to the taking of an aloetic, or indeed of any purge. In fact the drug, by obviating this state of the bowels, and removing these accumulations, is more likely to prevent and to cure, than to

occasion such a complaint. Besides, it admits of a question whether hæmorrhoids be not often as much dependent on some constitutional movement, as on local causes. Some French physicians hold this to be good doctrine, and there are not wanting reasons for thinking it so.

So far as my individual experience and observation go, I can aver having known piles occur during a very solvent and during a very costive state of the bowels, and both these states respectively continue for a long period, without hæmorrhoids supervening. They have appeared at times when the health of the individual was in its most perfect state, both generally and locally. Were irritation, warmth, and stimulation, so fruitful a source of hæmorrhoids, they ought never to be absent during dysentery and diarrhœa: here is a fire lighted up and burning within the body, yet how seldom are these diseases accompanied with piles? I have at this moment under my care a patient who at different periods of his life, when his health was sound and robust, has been subject to attacks of hæmorrhoids, and who, for the last year and a half, has laboured under a severely dyspeptic state of the constitution, with invariably slow, constipated bowels, requiring the free use of smart aloetic purgatives, yet not a trace of the complaint has been perceived.

It is much to be feared that the clamour raised against the aloes, on account of their warming and stimulating powers, may often have indisposed practitioners to use them in acute inflammatory cases, and induced them to flee to purgatives really more drastic and violent, but far less safe and certain. For myself, I have prescribed aloes in well-marked and very severe enteritis, and other acute diseases, and never knew it to fail, when other remedies of greater pretensions misgave. It was in no instance observed to augment pain or inflammation, but to alleviate, by removing that which was the cause of both. It was the only *sure* resource I had to trust to, and I never found my confidence misplaced.

It is now a long time since I adopted and acted upon these views. I shared at one time in the feeling of shyness as to the use of aloes, resulting from the prejudice I have endeavoured to expose; yet I never could explain satisfactorily why, in those cases which hap-

pened as it were accidentally, the disease was not aggravated by their exhibition. After reflecting a little, I put the matter to the test of experiment, and was not long in detecting the utter groundlessness of those charges attempted to be brought against one of the most potent auxiliaries which the medical art possesses.

Having thus, I hope, done what I purposed, let me call upon you, Mr. Editor, by all the means and influence which, as the conductor of a reputable and popular Journal, you must possess, to preserve from obloquy wholly undeserved this invaluable and most indispensable remedy. Let whoever would impute to it any injurious qualities, bring forward indisputable proofs of such qualities before he proceed to decry its merits. The substances in the *Materia Medica* on which any firm reliance can be placed are not so overabundant that they may be dispensed with at any time: strike out the aloes, or bring it into any thing approaching to disfavour, and see how many equally safe and certain cathartics would be left.

Before I have done, pray, Mr. Editor, let me ask you what insuperable objection would lie against having one *Pharmacopœia*, and one *Dispensatory*, instead of having one of each for each of the three kingdoms? The same formula for a purgative pill that opens one man's bowels in London or at the Land's End, would I apprehend do the same thing for another at John o' Groat's House, or any part of Ireland. Why might not a committee of one physician from each college, or three from any other quarter, who should sit in the character of arbiters, and whose decision should be final, to select from all the works the best articles and compositions, and thus form a *Pharmacopœia* which should serve for the whole empire*? One work would serve every good and useful purpose, and thus practitioners, be spared the expense and trouble of that trumpery of synonymes and multiplicity of preparations which has at length become an insupportable nuisance.

I am, Sir,

Your very obedient servant,

ΝΟΣΟΚΟΜΟΣ.

June, 1829.

* We fear this suggestion will never be carried into effect: a new London *Pharmacopœia* is in preparation.—E. G.

ANALYSES & NOTICES OF BOOKS.

“ L'Auteur se tue à alonger ce que le lecteur se tue à abrégér.”—D'ALEMBERT.

De Ovi Mammalium et Hominis Genesi Epistolam ad Acad. Imper. Scientiar. Petropol. Dedit C. E. à BAER, Zoologiæ Prof. P. O. Regiomontan. Lipsiæ, 1827. 4to. cum Tabula Ænea.

AMONG the many obscure points with which the history of generation in mammiferous animals abounds, none presents greater difficulties than the precise determination of the character of the vesiculæ Graafianæ, the changes they experience in consequence of fecundation, and their relations to the new being which is the apparent product of that process. The general analogy existing in the mode of development, as compared with that of the various classes of truly oviparous animals, together with the results of direct observation of the different stages of the generative function, and of its occasional imperfections, leave little room for doubting that the rudiment of the future being is actually derived from the ovary, but have hitherto failed in establishing the conditions of its previous existence, as well as the exact mode of its detachment and transmission through the oviducts to the uterus.

De Graaf, who, if not the first to discover, has at least the merit of characterizing the vesicles which bear his name, imagined them to be truly the ova of mammiferous animals, and has been followed by a long list of physiologists, who, in this view, compare each vesicle to the yolk of the egg of birds, and imagine that it, in the same manner, receives additional deposits on its external surface in its course from the ovary through the oviduct (fallopian tube). This hypothesis, however, though not yet abandoned, may be considered as perfectly refuted by the observations of Cruickshank, subsequently confirmed by those of Prévost and Dumas. They agree in stating that, in rabbits and dogs, the ova, examined during their passage through the tubes, are considerably smaller than the Graafian vesicles, as seen in the ovary; a fact utterly irreconcilable with their supposed identity.

The researches of Professor Baer, chiefly made on dogs, should they bear the test of repetition and inquiry by others, promise to afford an explanation of the discrepancy between the hypothesis and the facts opposed to it, by establishing the reality of the existence of ova within the ovary, and the nature of their connexion with the Graafian vesicles.

He was led to inquire upon those points after having performed various experiments, with the view of discovering the state and appearances of the ovum during its transmission through the tubes, and the early periods of its lodgment in the uterus; the results of which satisfied him that the very minute ova found in those situations could not be the Graafian vesicles themselves. In examining the external surface of the ovary in a dog, he observed, in almost every one of the vesicles *, a yellowish white spot, floating in the contained fluid, and without any attachment to the parietes of the vesicle, as was shewn by the effect of external pressure. Struck by such an unexpected circumstance, he opened a vesicle, extracted the floating granule on the point of a knife, placed it in the field of a microscope, and found with equal pleasure and surprise that its appearances were absolutely identical with those of the ova as already recognized in the tubes.

Farther observations, on the ovaries of many other dogs, presented similar results, there being scarcely an instance in which some at least of the ova might not be seen by the naked eye, floating within the vesicle, before the latter was opened. In young animals, pregnant for the first time, but few ova can be thus observed; whence the author infers that copulation, in addition to the fecundation of one or more ova, may have the effect of accelerating the evolution of others; and suggests that an influence of this kind may serve to elucidate some remarkable and well-known instances, in which the produce of a second impregnation of the same female has resembled the male progenitor of a former race.

The ova in question, when removed from the Graafian vesicles in which

* In order to understand this statement, it is necessary to recollect that, in many mammiferous animals, the vesicles are much more distinct from the mass of the ovary, and project more decidedly from its surface than is usually the case in man.

they are lodged, present an opaque granulated spot in the centre, surrounded by an annular disk, composed of semi-pellucid granular matter. They vary in size, according to the degree of their development: the larger being from one-thirtieth to one-twentieth of a line in diameter, and the smaller, the centre of which also is less opaque, scarcely one-fiftieth.

The annular disk, compared by the author to the belt of Saturn, and called by him *discus proligerus*, exists in all, but is smallest and most transparent in the smallest ova; and surrounds the ovum like the frame or setting of a lens.

According to Professor Baer, the Graafian vesicle, within which the ovum is thus contained, has the same general structure in the species of animals he examined with reference to this point—viz. man, the cow, sheep, dog, rabbit, hedgehog, porpoise, dolphin, and sow. Besides the coverings it receives from the peritoneum and proper substance of the ovary, the vesicle itself is enclosed within a cyst, or sheath, consisting of two layers: an outer one, thin, firm, and semi-transparent; and an inner one, thicker, softer, more opaque, and with a granular or villous surface. The separation between the two layers can be easily effected when the vesicle is large, particularly in the sow; the innermost, as is sufficiently plain from the description, resembling mucous membrane in the most important points of its structure.

That part of the cyst which eventually gives way when the vesicle contained within it escapes from the ovary, appears thinner than the rest, some time previous to the rupture. Thus, too, in the turgid vesicle of the sow, a transparent spot makes its appearance, surrounded by a whitish irregular margin, similar to that which subsequently surrounds the corpus luteum.

The fluid of the Graafian vesicle itself is contained within a membrane distinct from the double covering above described. Its texture is granular, very delicate, particularly in mature vesicles, and very similar to the membrane of the yolk of the ovum of birds. Fragments of it may always be discovered by the microscope, when the contents of a ruptured vesicle are examined, especially if the turgid vesicle have been previously macerated for a day or

two. It is easily lacerable, and is always torn where the contained ovum enters the tube. Whilst the ovum is on its passage through the tube, or has but recently reached the uterus, fragments of the membrane are always to be found in those organs.

The fluid of the vesicle is viscid, pellucid, with a yellowish tinge when the vesicle is turgid, and contains minute granules. It coagulates, like albumen, by the action of heat, and by means of alcohol is converted into a granulo-flocculent mass.

The ovum, encircled by its proligerous disk, floats on the surface of the fluid, in the midst of a hazy mass of granules, differing from those of the fluid in being white instead of yellowish. The disk, with the accumulation of granules around it, exists in all mammiferous animals, and may be seen by opening the vesicle under water, and examining its contents with the microscope. Their position is not so easily determinable, for it is only in the dog that the ovum and its disk can be seen shining through the coverings of the Graafian vesicle. In two instances, indeed, among nearly one hundred, where the ovary of the sow was grasped by the extremity of the tube, the author saw the contents of the larger vesicles shining distinctly through their coverings. In the rest, though the ovary was in many cases grasped by the tube, nothing could be seen until the vesicle was cut into; but, as the fluid at once escapes as soon as its coverings are injured, it is in this way impossible to examine the ovum and disk in situ. In the dog they are moveable, but placed nearer the prominent surface than the base of the vesicle; and, in general, the author is disposed to believe that as the ovum approaches nearer to the period of maturity it approximates to the circumference of the vesicle.

The ovum itself is more pellucid in other animals than in the dog, and consequently is generally undiscoverable without the help of the microscope before its removal from the ovary. It consists of a transparent margin and an opaque central mass, which, however, when minutely examined, seems to have a small cavity. Its size varies in different animals: it is tolerably large in the cow, sheep, sow; smaller in the rabbit; smaller again in the dog; and least of all, as compared with the ovary

and body in general, in the human female. Once in the dog, and once in the sow, the author found two ova in a single vesicle, which, he observes, may explain the occasional want of coincidence between the number of ova and of corpora lutea.

As regards the corpus luteum, in the view which Professor Baer takes, it is not altogether a new production; but, on the contrary, is formed by the internal layer of the ovarial cyst in which the Graafian vesicle was contained previous to its expulsion. That such is the case he infers from the nature of the layer or coat within which the corpus luteum is lodged, and from the conditions of the aperture in it relatively to the coverings of the ovary itself. The Graafian vesicle, with its contents, having been expelled, the cyst or sheath in which it was lodged is occupied by an albuminous fluid, subsequently displaced by the protrusion of the inner membrane in irregular yellow masses, obliterating the cavity, and constituting the corpus luteum. Professor Baer farther expresses his belief, that the corpus luteum not merely appears immediately after the escape of the Graafian vesicle, but rather that the metamorphose of the inner layer of the ovarial cyst in which the vesicle is situated commences at an earlier period. Thus, in a rabbit, several ova had already reached the uterus, a single vesicle, however, still remaining perfect and turgid within the ovary. It contained an ovum, and yet it might be said that a corpus luteum was also present, though incomplete, and without the usual protuberances of the inner layer of the sheath. The same fact was observed in the turgid vesicles of swine, the inner layer of the sheath being thickened, and of a yellowish red colour, which in these animals is the ordinary appearance of what must, for the sake of uniformity, be called a corpus luteum: it is of the same colour in the dog; in the cow it is of a yellowish orange colour; and in woman yellow.

Professor Baer supposes that the Graafian vesicle being turgid and entire, the inner layer of its sheath is thickened, and becomes more vascular; and that when the coverings derived from the ovary burst, so as to permit its escape, the retraction of the external layer of the sheath and of the surrounding cellular substance throw the inner layer into the folds which project into and fill

up the cavity previously occupied by the vesicle. The process seems to be similar in the human female: thus, in a lascivious girl, Professor Baer found the inner layer of the sheath vascular and perfectly yellow, whilst the vesicle was turgid and still lodged within the ovary. In another woman, who destroyed herself in consequence of impregnation, he found a corpus luteum opening on the surface of the ovary: its cavity, as compared with the size of the Graafian vesicle, was greater than that of the corpora lutea of any other animal, and the protuberances on its inner surface smaller; a difference which he explains by the greater density of the cellular substance in man allowing less retraction of the surrounding parts after the escape of the vesicle.

The remaining parts of the essay treat of the subsequent development of the ovum, and of the various circumstances tending to establish the analogy between the ovum of mammalia and of other animals. On these points, however, it is unnecessary, and would not be possible to enter, in a limited space.

The novel statements, of which we have attempted to give some account, must be allowed to form a most important addition to an interesting portion of the history of the animal œconomy, and will reflect additional honour on the German school of physiology, already so distinguished in every thing relating to this department of the science.

Travels in Turkey, Egypt, Nubia, and Palestine, in 1824-5-6 & 7. By R. R. MADDEN, Esq. M.R.C.S. 2 vols. London, Colburn, 1829.

THESE very entertaining volumes are from the pen of a professional man, and alike creditable to his industry and his learning. Many of the incidents of his journey are full of interest, and these, together with the scenery through which he passed, are depicted by Mr. Madden with very great spirit. His style of composition is remarkably pleasing, and his language both forcible and elegant. The state of medicine in the countries through which he travelled naturally attracted a considerable share of his attention, and ample opportunities appear to have been afforded him of ascertaining its exact condition. As a *hakkim* he was courted by

the great, and pestered by the poor—the doors of the harem were opened to him, and the secrets of that prison-house displayed. On several occasions he had opportunities of seeing the plague, and these he availed himself of with a proper degree of professional zeal, but without any of those absurd attempts at bravado which have cost some English physicians their lives, and others their character for common sense. Mr. Madden is no theorist, and he has the great merit of describing the plague, perfectly indifferent whether the reader believe it to be of endemic or of epidemic origin.

The work is composed in the form of letters to his principal friends. His female acquaintances are treated with descriptions of a Turkish toilette and Arabian dinner parties. The Rev. Mr. M'Pherson has described to him the route of the Israelites; and Thomas Coltman, Esq. barrister, receives copious details of Turkish law and its consequences—the sack, the bow-string, and the bastinado. The medical correspondents are Dr. James Johnson, Dr. Gregory, and Mr. Brookes.

We shall occasionally avail ourselves of Mr. Madden's pages to put our readers in possession of the present state of physic and surgery in the land of the Moslem, as contained in a letter to Dr. Gregory.

MEDICAL PRACTICE IN CONSTANTINOPLE.

Constantinople, Oct. 25, 1824.

DEAR SIR,—The practice of physic in this country is of so extraordinary a nature, that I presume you will take some interest in the history of its absurdity.

There are about fifty medical practitioners in Constantinople, principally Franks, from Italy and Malta, and a few Ionian Greeks, Armenians, and Copts; of this number there are, perhaps, five regularly educated physicians, and two of these are English gentlemen, highly respected both by the Turks and Franks. Every *medico* has his allotted quarter; he beats this ground daily in pursuit of patients, and visits all the coffeehouses in the district with a Greek *drogueman*, as interpreter, at his heels, whose occupation is to scent out sickness, and to extol the doctor. They are ever to be found on

the most public bench of the coffeeshop, smoking with profound gravity, and prying into the features of those around them for a symptom of disease. I confess I had to descend to this degradation to get practice, in order to become acquainted with the domestic customs of the people. The first day my *drogueman*, who had just left the service of a Roman doctor, and had been practising on his own account since his discharge (for all *drouguemen* become doctors), took upon him to teach me my professional duty, which he made to consist in never giving advice before I got my fee—in never asking questions of the sick—and in never giving intelligible answers to the friends; I was to look for symptoms only in the pulse; I was to limit my *prognosis* to three words, *In Shallah*, or “Please the Lord,” for doubtful cases; and *Allackharim!* or “God is great!” for desperate ones. I took my post in the coffeeshop, had my pipe and coffee, while my *drogueman* entered into conversation with the Turks about us. I soon heard him narrating a history of a miraculous cure, which he had seen me perform some days before, on the body of a dying Effendi; how I had taken out his liver, and put it in again, after scraping off the disease, and how the patient got well the next day, and gave me five purses. I was exceedingly annoyed; but the fellow seemed to mind my anger little, and even reproved “my want of prudence” with a frown.

Now, the only thing that could have given origin to “the scraping of the man's liver,” &c. was my having opened a boil on his own back the day before. The Turks swallowed this story; had it been more marvellous, it would have been still easier digested; one turned up his eyes, and said, “there was but one God;” another praised my skill, and cried, “Mahomet is the friend of God!” The latter gentleman held out his wrist to have his pulse felt, and said, in a very civil tone of voice, *Guehl, giaour*,—“Come, you dog.” This endearing epithet Turks consider ought not to give an infidel offence, because it is more a man's misfortune than his fault to be born “a Christian,” and consequently “a dog.”

My Greek, whose familiarity was very offensive, (and it is a national fault,) now whispered in my ear, “No bite, that fellow never pays.” I gave the

man, however, my advice, and got a cup of coffee in return.

A well-dressed man, who had been sitting by my side in silence for half an hour, at last recollected he had a wife or two unwell, and very gravely asked me, "what I would cure a sick woman for?"—It was a question to delight the soul of Abernethy. I inquired her malady,—“she was sick.” In what manner she was affected,—“why, she could not eat.” On these premises I was to undertake to *cure* a patient, who, for aught I knew, might be at that moment *in articulo mortis*. I could not bring myself to drive the bargain; so I left my enraged drogueman to go through that pleasing process. I heard him ask a hundred piastres, and heard him swear by his father’s head and his mother’s soul, that I never took less: however, after nearly an hour’s haggling I saw fifty put into his hand; and the promise of a hundred more when the patient got well, I saw treated with the contempt which, in point of fact, it deserved. No man makes larger promises than a Turk in sickness, and no man is so regardless of them in convalescence. I visited my patient, whom I afterwards found both old and ugly; but I was doomed on the first occasion to see no part of her form; she insisted on my ascertaining her disease with a door between us, she being in one room and I in another; the door was ajar, and her head enveloped in a sheet, as it was occasionally projected to answer me, was the only part of her I had a glimpse of. This was the only woman I ever attended here, or in the islands, who would not suffer the profanation of my fingers on her wrist. I, however, could just collect enough from the attendants as to cause me to *suspect* she had a cancer; and I did all, under such circumstances, that I could well do,—I gave her an opiate. This lady was no sooner prescribed for than my attention was directed to the youngest wife, who was pleased to need advice, though her sparkling eyes and smiling lips denoted little of disease. She was extremely pretty, and removed her veil with little difficulty; but she would have her pulse felt through a piece of gauze, which was sufficiently thin to transmit, not only the pulsations of the artery, but also the pressure of the fingers, which mode of communicating symptoms I found a very common one in practice.

I ordered her some medicine, which I am quite sure she did not take, and which, in all probability, she did not require. After smoking a pipe, and drinking sherbet, I took my leave.

In a few days after this my first visit in Constantinople, I was sent for to the house of a grandee, where a consultation was to be held on a Pacha’s case, and one of great importance. I found the patient lying in the middle of a large room, on a mattress spread on the carpet; for “the four-posted beds” of Don Juan and Dudu have no existence in Turkey, and both gentlemen and ladies repose on their mattresses thrown on the carpet of the divan in their daily habiliments, none of which they doff at night.

A host of doctors, Jews, Greeks, Italians, and even Moslems, thronged round the sick man; and amongst them were jumbled the friends, slaves, and followers of the patient; the latter gave their opinion as well as the doctors, and, in short, took an active share in the consultation. But he who took upon himself to broach the case to the faculty, was a Turkish priest, who administered to the diseases both of soul and body. He prefaced his discourse with the usual origin of all things: he said,—“In the beginning God made the world, and gave the light of *Islam* to all the nations of the earth. Mahomet (to whose name be eternal honour) was ordained to receive the perspicuous volume of the Koran from the hands of the angel Gabriel; which book was written, by the finger of God, before the foundation of the world; and in its glorious page was to be found all the wisdom of every science, whether of theology or physic; *therefore*, all learning, except that of the Koran, was vain and impious; therefore he had consulted it in the present case, and the repetition of the word honey, he discovered tallied with the number of days his highness suffered (to whom God give health); therefore honey was a sovereign remedy, and one of its component parts was wax, a true specific for the disease before them. Did not the bee suck the juice of every herb? was there not wax in honey? did not wax contain oil? *therefore*, why not try the oil of wax? Oh! illustrious doctors!” he continued, “let us put our trust in God, and administer the dose: our patient has been thirty-six days

sick, *therefore* let him have six and thirty drops every six and thirty hours. And as there is but one God, and Mahomet is, *therefore*, his prophet, let the oil of wax be given!"

The moment this rigmarole ended, all the servants, and even many of the doctors, applauded the discourse.

There was no time allowed for discussion; the same archpriest took care to see the doctors feed forthwith; each of us got four Spanish dollars, and left the unfortunate sick man to his fate: but going out, when I expressed my astonishment to one of the faculty (an old Armenian), about the exhibition of this new remedy, he looked around him cautiously, and whispered in my ear the word "poison!" On further inquiry, I found the bulk of the patient's property was invested in a mosque. In spite of the remonstrance of my drogue-man, I returned to the door I had just quitted, and gave an attendant to understand, his master would die if he took the medicine. The poor man died, however: I heard of the event about a month afterwards.

I was shortly after called to a man who was said to have a fever: when I visited him, I asked what was the matter with him, and where he felt pain? but his friend made the customary reply, "That is what we want to know from you; feel his pulse, and tell us!" I accordingly did so, found it rapid, his breathing laborious, and his skin hot; but not one of the symptoms could I get from the patient or attendants. The Turks have the ridiculous idea, that a doctor ought to know every disease by applying the fingers to the wrist. I thought from what I observed I was warranted in taking blood in this case. I did so; but no sooner had I bound up the arm, than I was requested, for the first time, to examine the other hand, which I did, and, to my utter astonishment, found two of the fingers carried away, the bones protruding; and then only was I informed, that the patient was in the artillery, and had lost his fingers a week before by the explosion of a gun.

I suspected at once the occurrence of locked jaw; I felt his neck; it was like a bar of iron; the man had been labouring under tetanus for three days, and died the following morning. You may well conceive my indignation at

such incredible stupidity as the attendants exhibited here, and my choler at being told the result "had been written in the great book of life," and could not be avoided or deferred. Be that as it may, I certainly would not have bled him, had I any reason to suspect the affection of which he died. You may imagine how difficult it is for a medical man to treat such people; and, consequently, how rarely they are benefited by him. There are few Mahometans who do not put faith in amulets; I have found them on broken bones, on aching heads, and sometimes over love-sick hearts. The latter are worn by young ladies, and consist of a leaf or two of the hyacinthus, which the Turks call "mus-charumi:" this is sent by the lover, and is intended to suggest the most obvious rhyme, which is "ydskerumi," and implies the attainment of their soft desires.

Sometimes these amulets are composed of unmeaning words, like the *abracadabra* of the ancient Greeks for curing fevers, and the *abracalans* of the Jews for other disorders. At other times they consist simply of a scroll, with the words *Bismillah*,—"In the name of the most merciful God," with some cabalistical signs of the Turkish astrologer Geffer; but most commonly they contain a verse of the Koran.

I think the most esteemed in dangerous diseases, are shreds of the clothing of the pilgrim camel which conveys the Sultan's annual present to the sacred city: these are often more sought after than the physician, and frequently do more good, because greater faith is put in them.

The most common of all these charms is the amber bead, with a triangular scroll, worn over the forehead, which the *Marabouts* and the Arab sheiks manufacture, and is probably an imitation of the phylacteries which the Jews were commanded "to bind them, for a sign, upon their hands, and to be as frontlets between their eyes." It would be well if no more preposterous and disgusting remedies were employed; but I have taken off from a gun-shot wound a roasted mouse, which, I was gravely informed, was intended to extract the ball.

A less offensive and a more common application to wounds, is a roasted fig. I believe old women prescribe it for

gumboils in England, and the practice is as old as Isaiah, who ordered "a mass of figs" to Hezekiah's boil.

Of all Turkish remedies the vapour bath is the first and most efficacious in rheumatic and cuticular diseases. I have seen them removed in one-fourth part of the time in which they are commonly cured with us. In such cases I cannot sufficiently extol the advantages of the Turkish bath: the friction employed is half the cure, and the articulations of every bone in the body are so twisted and kneaded, that the most rigid joints are rendered pliant.

I have trembled to see them dislocate the wrist and shoulder joints, and reduce them in a moment; their dexterity is astonishing, and Mohammed's shampooing, at Brighton, is mere child's play in comparison. Query—Would not gout be benefited by this remedy, provided it could be really introduced into England as it is used in Turkey?

As a luxury, I cannot better describe it than in the words of Sir John Sinclair:—"If life be nothing but a brief succession of our ideas, the rapidity with which they now pass over the mind would induce one to believe, that, in the few short minutes he has spent in the bath, he has lived a number of years."

I cannot conclude without telling you how all Frank medical men are teased by the Turks for *aphrodisiacs*, which they denominate *madjoun*; I am solicited for it at every corner; and it is lamentable to observe, that hardly a man arrives at the age of five and thirty, whom debauchery has not rendered debilitated, and dependent on adventitious excitement for his pleasures. The ladies, on the other hand, are desirous of gaining honour by a progeny like Priam's, but they have few children in general, for polygamy is, probably, injurious to population. They cease not, however, to annoy me for medicines to make them fruitful; and are as solicitous for specifics as Rachel was to obtain from her sister some of the prolific mandrakes.

I had always occasion to observe that the sick man was all civility and courtesy when his life was in jeopardy, but the moment he became convalescent he treated me with arrogance, as if he had been ashamed of letting an infidel see that a Moslem was subject to the infirmities of humanity. My services

were forgotten whenever they ceased to be required. All the other medical men complained of the same ingratitude; indeed, no physician opened his mouth till the patient opened his purse. The Greeks certainly behave better in this respect; but yet there is that strange obliquity of principle in them, that I never doubted, while a Greek fed me generously with one hand, that he would not have picked my pocket with the other at the same moment. Such is the low state of medical science in this country; and such, probably, it was in Europe so late as the tenth century. It has been well remarked, that the state of medicine may be considered as the criterion or barometer of the state of science in a nation. Wherever science and refinement have extended their influence, there medicine will be most cherished, as conducive to the interests and happiness of mankind.

[To be continued.]

MEDICAL GAZETTE.

Saturday, July 4, 1829.

"Licet omnibus, licet etiam mihi, dignitatem *Ar-
tis Medicæ* tueri; potestas modo veniendi in pub-
licum sit, dicendi periculum non recuso."—CICERO.

DR. HARRISON AND THE COLLEGE OF PHYSICIANS.

THIS gentleman, after a long silence on the subject of his contest with the College of Physicians, has at length put forth what he is pleased to call "some particulars connected with that celebrated struggle." Being desirous, at the same time, that these "particulars" should be communicated to the profession through a respectable and appropriate medium, he has embodied them, in the form of a letter, to the worthy churchwarden of St. Giles's. The document, which is penned in the style of fanfaronade which heretofore rendered his words such a ludicrous contrast to his deeds, consists of various positions or arguments, some of which set forth the services he has done the "State," while the others are made up of a mixture of apology for the line of defence which he

adopted, and of reproaches for the manner in which he has been treated by the public. As the questions involved are interesting to a large body of the profession, we shall take the liberty of offering some remarks on Dr. Harrison's tardy explanation of his conduct.

The first position assumes that the late trial records the first failure (*i. e.* of the College) since the enactment of their present by-laws. This we believe to be true; but, at the same time, it is rather an extraordinary fact for Dr. Harrison to put forward, as it is equivalent to admitting, first, that in none of the previous cases did any one, even for the sake of obtaining a verdict, descend to the paltry subterfuge by which he gained his cause; and, secondly, it affords very strong presumptive evidence that the powers of the College are legal, since all previous decisions have been in their favour.

Dr. Harrison also informs us that the result in his case "has established the important fact that they (the by-laws) are not only illegal, but, what is scarcely to be credited, that their validity can only be successfully opposed by the Fellows themselves." This part of the doctor's argument, like many others, is somewhat inclusive. The by-laws of the College were not mentioned on the trial—the defendant was not allowed to say a syllable about them. Nay, Dr. Harrison himself describes his vexation on finding "that the College would not be called upon to defend their by-laws; and, what was more mortifying still, that the judges would not suffer him to dispute their validity in a *qui tam* action;"—and even with regard to his own propositions, concerning the regulations of the College, he found that "not one of them would be suffered to occupy the Court for a single minute." How, then, those by-laws were proved to be illegal which were not even

brought into dispute we must leave it for Dr. Harrison to shew. But this is not the only part of the paragraph which is unsatisfactory, for, after being told that the by-laws are "illegal," it is immediately added, "that their validity can only be successfully opposed by the Fellows themselves." What the exact meaning intended by this sentence may be, we do not pretend to guess, but to an ordinary comprehension it would imply that there are certain illegal enactments which may be put in force against his Majesty's lieges, which no one can oppose with success unless he be a Fellow of the Royal College of Physicians in London; an assertion which we have the doctor's own authority for affirming, "is scarcely to be credited."

When we had read thus far, we began to despair of what the doctor calls the "sacred cause," and our despondency was at its *acmé* when we found that nothing more was to be expected from the champion who had already accomplished so much—in the way of boasting and bravado. "What is done for the improvement or credit of the repudiated physicians *must be achieved by themselves*. This is really the fact, and I shall not attempt either to disguise it or to mislead the public." The doctor, in this respect, need be under no apprehension, for there is little risk of the public being again misled by any thing he can say on this subject. Indeed the letter before us affords incontestible evidence of this, for, after speaking of the "tortuous track" which he had followed, he exclaims with amusing simplicity—"During this fatiguing journey I was left to pursue my route alone, neither meeting with a solitary companion to lessen my toil, nor any one to offer me the smallest accommodation"! Nothing can more clearly shew the opinion of the profession than this passage, in

which the writer unwittingly records his own shame—calling his conduct a “tortuous track,” and avowing that he did not even meet with a “solitary companion” on his way. But he forgets. He did meet with a companion in his “tortuous track,” and that no less a person than Dr. John Gordon Smith, Professor of Medical Jurisprudence in the London University! Dr. Harrison’s ingratitude in forbearing to mention his name is the more unpardonable, as the worthy Professor not only stood by him when, by his own account, all others had abandoned and shunned him, but even wished to take the entire burthen off his shoulders. If any man is dissatisfied, said Dr. J. G. Smith, “LET HIM LOOK TO ME FOR FARTHER EXPLANATION OF THIS MATTER.” Nay, so entirely was this *fidus Achates* at the service of his friend, that he positively declared Dr. Harrison to be a man “who does not possess a single idea or feeling which is not a great honour to human nature.” That such disinterested zeal should thus be suffered to pass unnoticed and unrequited, standing alone as it did amid the host who contemned the object of the eulogy, is a melancholy illustration of what they must expect—whose zeal outstrips their discretion.

But Dr. Harrison goes on to argue, first, that he could not have adopted any other course than he did; and, secondly, that no “human being” has a right to find fault with him. We deny both of these assumptions. He professed to be a *physician*—he declared that he would try the question with the College whether they had a right to interfere with *medical* practice. In his defence he argued that he was not a physician, but a *surgeon*. He says that the defence was that of his Counsel, not his own. We answer that he sat by Mr. Campbell, and could in one moment—by a word—by a look, have checked a line of argu-

ment in direct variance with his public statements, and derogatory to his character as a man of plain dealing and consistency. As to the assertion that no one has a right “to call him to account,” it is absurd. Let him remember that it was *he* who insisted on making this a public matter—that it was *he* who sent his letters to the various medical journals and daily papers, and it is too late, having thus courted public discussion, to say we have no right to enter upon it, merely because he finds the tide has turned against him.

Another curious specimen of the Doctor’s “tortuous track” comes out on the present occasion. It will be remembered that he, among other pieces of boasting, offered to afford every facility to the College to try the question. Now it appears, by his own shewing, that at this very time he was endeavouring to prevent the witnesses from coming forward to give their evidence. He knew that Miss Orton had been attended by him—“I therefore (says he) interrogated her strictly concerning the part she intended to act on my trial. She replied that no prescriptions of hers should ever be turned against me”! He also employed a “mutual acquaintance to call and ascertain, if possible, the temper of her mind”!! It is perfectly obvious from this that Dr. Harrison all along entertained the design—not of meeting the question fairly—not of ascertaining whether the College had a legal right to prevent him from practising—but of making his escape by keeping back if possible the necessary evidence; and this he has the assurance to call proving the illegality of the College statutes. As was well argued by a correspondent soon after the trial, “It would be quite as reasonable to say that a man committing an assault who escapes punishment because the prosecutor cannot bring witnesses of the fact, had settled

the question that there was no power in the law to punish the commission of such an offence."

But there is another part of Dr. Harrison's letter, with regard to Miss Orton, which we cannot allude to without indignation. He says she had lived before the trial in the house of a respectable family; and then adds, "why she left it abruptly, to live secluded with a young medical bachelor, forms no part of my present inquiry." Assuredly it does not; why then is this statement made at all? what has the circumstance therein detailed to do with the fact of Dr. Harrison having written prescriptions for her, and those prescriptions having been produced in court? whether obtained from her, or from her servant, or from the chemist, we know not.

Not content with this ungenerous revenge, he next proceeds to insinuate a charge of bribery against her and her attendant, and of suborning their witnesses against the College:—

"The Fellows, I am informed, complain bitterly of the heavy cost of the trial. How all their money was expended, does not appear. In the absence of direct proofs, we may be suffered to conjecture, that if Miss Orton was really endowed with greater fortitude than Danae, some of her partisans might not be equally insensible to the magic influence of a 'golden shower.'"

This insinuation against the College neither merits nor requires any answer. Of Miss Orton we know nothing, but the reader will scarcely believe that, after all, she did not appear as a witness, but that all this indignation arises from the circumstance of some of her prescriptions having been produced in evidence. It is amusing, after all these rancorous insinuations against her, to find the author of them coolly asserting that he feels "no desire to retaliate upon an unprotected female"!!

With regard to the general question, as concerns the College of Physicians,

none but a hot-headed enthusiast would dream of denying that they have the power of levying a fine of five pounds a-month on any physician who practises in London, or within seven miles thereof, without a license. But to do this, it is necessary for them to be able to bring *legal* proof of such practice, and this is always difficult. It is difficult to procure prescriptions when the physician is anxious to prevent it, and it is difficult to guard against some quibble, such as that adopted in Dr. Harrison's case; an act of meanness, however, which we have that gentleman's authority for stating no physician ever had recourse to before.

Dr. Harrison speaks of the Licentiates "cringing" to the Fellows; however that may be, this Journal has never cringed to them. When we have thought any part of their policy bad, either as regards themselves or others, we have not hesitated to express our opinion; and, on several occasions, this has been fully and freely done. On the subject of admission to the Fellowship (the source of this same "celebrated struggle"), we say, that, in our judgment, it would add much to the respectability and dignity of the College, while it would tend to remove the jealousy of the Licentiates, if they made admission to the Fellowship always elective, and not a matter of course to English graduates. In an English College of Physicians, it is perfectly fair that a reasonable preference should be given to the graduates of English Universities; but as long as any can claim admission as a right, or obtain it as a matter of course, so long will the College fail to be a *select* body.

DR. PROUT.

ON Thursday, the 25th instant, this gentleman was elected a Fellow of the College of Physicians, in conformity,

with what has recently become the custom, of admitting a Licentiate annually to that honour. In looking round among the profession, it would be impossible to fix on any one who bears a higher character as a man of science, or in whom great attainments are associated with a disposition and manners so entirely unassuming. The choice cannot but meet with general approbation.

Would not the committee employed in preparing the new Pharmacopœia do well to add him to their number in lieu of Dr. Young?

EVENING MEETINGS AT THE COLLEGE OF PHYSICIANS.

THE meetings for the season terminated last Thursday, on which occasion an abstract was read by Dr. Macmichael from the Report of the Board appointed to investigate into the history of the Fever lately prevalent at Gibraltar. The documents from which the above was made out were transmitted by the Colonial Secretary to Sir Henry Hallford, and were laid upon the table.

The chief points we understood to be that, in the opinion of the Board, the fever was imported from the West Indies; that it was contagious; and that the same individual was not susceptible of more than one attack. As we hope to be able to give a full account of this subject hereafter, we shall not now enter upon the discussion. Great and well merited praise was bestowed on Mr. Pym for the zealous and intelligent manner in which he conducted the investigation.

The different tables of the library were covered with recent specimens (some of them very fine) of the plants from which the articles of the *materia medica* are taken.

The utility of these meetings cannot now be questioned. Nothing rubs down

the asperities of the English character so much as bringing men into contact with their brethren; and, where there is a mutual desire to please and to be pleased, the result cannot fail to be favourable. We therefore hope to see these meetings resumed next season, and doubt not but we shall find them as well attended as they have heretofore been.

EXTRACTS FROM JOURNALS, *Foreign and Domestic.*

PREGNANCY, COMPLICATED WITH MALIGNANT TUMORS.

ROSALIA JULIEN was married in 1822, at the age of 27, and after the lapse of three months miscarried, the foetus apparently of about six weeks. Nine months after this her husband died. The widow, greatly affected, suffered from derangement of health; she observed, notwithstanding the menses were regular, that her abdomen increased in size; a sense of weight obstructed her in walking, and she had frequent desire to pass her urine. In the course of three years the size of the abdomen increased slowly, and at the end of that time it assumed the appearance of a person about four or five months gone with child. M. Troussel, consulted in 1826, recognised in the hypogastric region a hard, round, indolent tumor, dipping down into the pelvis, easily detected by the touch either through the rectum or vagina, having about the size of the head of a full-grown foetus. This tumor had depressed the uterus, but without deranging the menstruation, or disordering any of the other functions. From the above period the abdomen did not increase in volume, the general health continued good, and, in January 1828, the woman was married again. In the month of April following there was reason to suspect pregnancy; the abdomen enlarged so as to make walking troublesome; shooting pains in the hypogastrium, particularly on the right side, took place; nevertheless, the condition of the uterus could not be ascertained. The belly continued to increase, especially on the right side; the patient was obliged to remain in the recumbent

posture; the pain became more frequent and severe; sleeplessness, emaciation, fever, and diarrhœa ensued; and death took place on the 5th Sept. 1828. On opening the body, the abdomen was found almost entirely occupied by an enormous tumor, of from 13 to 15 inches in diameter, having a fibrous appearance, and presenting within it several isolated cavities, formed in a schirrous, encephaloid tissue, of a reddish white colour, and of a variable consistence; the uterus was pushed into the left side of the abdomen, and contained a foetus of four or five months. In the parietes of the uterus four small tumors, of a fibrous nature, were found. The large swelling had been developed between the two layers of the broad ligament; it adhered to the uterus for a considerable extent by a dense cellular membrane, and by a kind of pedicle, short and broad, about an inch across, of a fibrous nature, intimately united to the fibres of the uterus, and fixed to the right side of that organ near the insertion of the vagina.

The reporter makes no mention of the relations of this tumor with respect to the ovary of the same side; but, from its situation, it may be presumed to have had its original seat in that organ.—*Bulletin des Sciences Médicales, Avril.*

EXTIRPATION OF THE LEFT OVARIUM.

A woman, 38 years of age, had borne five children in the space of seven years. After her fourth delivery she suffered from inflammation of the womb: from that period she complained of a dull pain in the left side of the hypogastrium, and about a year and a half after her last confinement she perceived a small tumefaction on the left side: a few sulphur baths caused it nearly to disappear for a time, but latterly it had extended over the abdomen. Two years subsequently to this her menses were followed by a malignant fluor albus, which added to the debility already induced. Dr. Chrymer having decided on the nature of the affection, and the patient having consented to the operation, it was performed by making an incision from the xyphoid cartilage to the pubes, leaving the navel to the right; the opening made into the peritoneum caused a prolapsus of a great part of the intestines: they were immediately enveloped in a warm and moist

cloth. The adhesions of the tumor to the peritoneum and to the edge of the pelvis were then divided, a double ligature was applied to the pedicle of the tumor attached to the broad ligament, which was divided an inch below the ligature. The intestines, which had been wrapped in the towel about five or six minutes, were then replaced within the abdomen, the serosity accumulated in the pelvis was wiped off with a sponge, and the wound closed by suture. The operation lasted a quarter of an hour, and the patient lost only a few ounces of blood: an emulsion, containing nitre, was ordered immediately, and hiccup with cold shivering shewing themselves after some little time, some doses of laudanum were administered. The cure was not interrupted by any accident, and at the end of six weeks the woman returned to her native place. Since this operation she has borne a healthy child. The tumor weighed 8 pounds, exceeded in size the head of a child, was irregular on its surface, livid in some places, and within, presented cavities, some filled with a fluid of the consistence of honey, and others with a greenish and sanious liquid.—*Graefe and Walthe's Journal.*

Five cases (of which the above is the 4th,) wherein operations for the extirpation of diseased ovaria were either attempted, or actually performed, are published in the "Archives Générales" for May. The above case was successful. In the 1st the tumor was so attached that the extirpation could not be performed; the abdomen was therefore closed, and the woman escaped with difficulty from the consequences; the 2d, the patient died 36 hours after the operation; the 3d case also perished at the same period. In the 5th case the tumor was so firmly adherent that it could not be removed, but the operator cut away the sac, and was under the necessity of securing some arterial branches: the woman died in 36 hours.

HOSPITAL REPORTS.

HOTEL DIEU.

Poisoning by Acetate of Copper—Efficacy of Albumen.

A MAN, aged 26, of fair complexion, and not very robust, who had lived in

Paris for the last four years, had experienced several attacks of vomiting and purging; was thin, pale, and of a very melancholy character. In 1824 he tried to poison himself by eating some *cicuta virosa*, but from the effects of which he soon recovered.

On the 18th October, 1825, he put eight sous pieces into a glassful of strong vinegar, and suffered them to remain there until the 25th. On that day he made a full dinner at 2 o'clock in the afternoon, and drank a bottle of red wine. At 4 o'clock he took half a glassful of the vinegar and copper, taking care to stir the money previously. After the lapse of another quarter of an hour he drank the remainder of this mixture; he then washed the sous afresh with a little vinegar, and afterwards with a small quantity of brandy, and drank the whole. At 7 o'clock his comrades found him stretched without sense upon the floor, and brought him immediately to the Hotel Dieu. On his admission it was observed that all the muscles were agitated with violent convulsions; the limbs remaining rigid in the intervals. There was much difficulty in supporting the patient. The teeth were firmly closed; the breathing short; the pulse hard, small, and very slow. The stomach was tender upon pressure, which produced violent convulsions. No intelligence could be obtained as to the substance swallowed; the lips did not retain any relics that indicated its nature, nor had the breath any particular odour. The mouth was opened at length, and some glasses of warm water forced down; the uvula and pharynx were tickled with a feather, but without effect. He drank in the interval between the convulsions; and in about a quarter of an hour he came to his recollection in some degree, and explained the cause of his poisoning. The whites of eggs were then mixed, and beaten up with water; and he swallowed immediately several large glasses. The convulsions ceased immediately, but the hiccup continued during part of the night.

On the 26th, in the morning, the pulse was large, slow, and intermitting; the belly contracted, hard, and very sensible all over to the slightest pressure; slight convulsions in the limbs; general lowness; tacurnity, and paleness; the pupils were dilated; the tongue soft, moist, and pale. Thirty

leeches were applied to the abdomen. Emollient cataplasms, decoction of linseed, glysters, and a rigid diet, were prescribed. In the evening the patient was worse; the agitation was extreme, attended with colics, dyspnœa, hiccup, and a hard and contracted pulse. Forty leeches were applied to the belly. The urine was scanty and scalding; the use of the water, with albumen, was continued; One hard motion followed the third glyster; the night was passed badly.

27th.—The amendment was striking; the pulse had become soft; the abdomen free from pain; the urine free; and a liquid motion had passed. The same treatment was continued. From this day the amendment continued; and in ten days the digestive functions were re-established, and all the bad symptoms had disappeared. The moral condition of the man had not, however, improved; he still continued taciturn, motionless, with a pale countenance, and a dry hot skin, and slept but little. He quitted the hospital on the 8th of November.

According to the experiments of M. Droussait, as recorded in M. Orfila's work, the acetate of copper is endowed with properties much more active than common verdigris, which is explained by the much greater solubility of the former substance.

In the above case the substance had been swallowed above three hours; the nature of the poison was then unknown, and there was nothing to lead to that knowledge. It was not known whether the patient had vomited or not; it therefore became necessary to provoke that action of the stomach. The patient, however, recovered in some degree, so as to explain the nature of the poison; then albumen was administered. All the pretended antidotes of copper are not to be compared to this simple means, so easily to be met with every where, and under all circumstances. The sulphurets of potash, of lime, and iron, mentioned by Navier, decompose the salt of copper, but the precipitate retains sufficient poisonous properties to produce mischief. Saline and earthy alkalis cause the same effects. The infusion of galls, mentioned by M. Chansarel, is nearly inefficacious. Sugar has been eulogized by M. Marcelen Duval as the real antidote to copper, but the experiments of MM. Orfila and Vogel have proved the

contrary. It is not so with albumen: this substance decomposes the salts of copper at an ordinary temperature; it should therefore be immediately administered, favoring the vomiting and purging by proper remedies. — *La Clinique*.

ROYAL INFIRMARY OF EDINBURGH.

Cases of Diseased Larynx, in which Tracheotomy was successfully performed.

CASE I.—MARGARET TAYLOR, æt. 28. When admitted into the clinical ward, on the 23d of May, her inspiration was performed with difficulty, was noisy and painful. The pain, which was increased by pressure, she referred to the larynx and trachea. She had a short painful cough, with difficult expectoration of a viscid mucus. There was much general pain and uneasiness of thorax, with inability to perform complete inspiration. Countenance expressive of much anxiety; superficial ulceration on fauces; a deep ulcer on uvula. Was first affected with sore throat three months ago. Her present complaints have continued for about a fortnight, commencing with difficult inspiration. Two days before admission the dyspnœa was so urgent as to threaten suffocation. When admitted it had in some measure subsided. She denied having been at any time affected by any venereal complaint, though she had lived very irregularly and intemperately, and been much exposed in the open air during the night.

Monday, May 25th.—To-day the difficulty of inspiration having greatly increased, tracheotomy was performed by Mr. Liston.

The patient having been seated on a low chair, an incision was made with a common scalpel through the integuments on the forepart of the neck, immediately below the thyroid gland. A second incision exposed the trachea, which was then perforated by the point of the knife from below upwards to the extent of half an inch. A common bronchotomy tube was immediately introduced into the trachea; this was followed by only two or three convulsive expirations, after which the respiration became perfectly natural.

After the incision of the trachea, Mr. Liston stated that he prefers the instant introduction of the tube; as, by its completely occupying the aperture, the ingress of blood into the windpipe is prevented; and, by its compressing the bleeding vessels, the hæmorrhage is more speedily arrested.

May 30th.—Once in twenty-four hours the tube is removed and cleaned. Lunar caustic is applied to the ulcers on the uvula

and fauces once every two days. Breathing and cough easier.

She has daily the simple decoction of sarsaparilla, and light nutritious food.

Since the operation her expectoration has been copious, but none of it appears to contain purulent matter.

On June 7th an irregular portion of bone was ejected by the mouth during a violent fit of coughing. On examination, it proved to be the left superior corner of the thyroid cartilage ossified.

The ulcerations on the throat have nearly disappeared; she can breathe much more easily through the glottis, and uses a smaller tube.

There is little doubt but the urgent symptoms in this case were caused by the death and separation of the portion of bone.

CASE II.—William Clough, æt. 42, was lately dismissed cured, on whom tracheotomy had been performed many years previously. Some account of this case will, we trust, not be found uninteresting.

In the year 1822, he applied to Mr. Liston, complaining of laborious respiration. Inspiration was performed with great difficulty, and attended with a peculiar hissing noise. Expectoration and deglutition difficult; countenance anxious. Frequently the dyspnœa was so urgent as to threaten immediate suffocation. Some weeks after the operation, on withdrawing the tube and closing the aperture, he breathed more freely through the natural passages; but on removing the tube, and allowing the aperture to close for a day or so, his former uneasy sensations returned; in consequence of which it was thought prudent to continue its use. About this time attempts were made to dilate the glottis, by the passing of bougies; this proved unsuccessful, in consequence of the irritation produced being intolerable.

The patient continued the constant use of a middle-sized tube until the 26th Nov. 1828, when he was admitted into the hospital under the care of Mr. Liston, complaining chiefly of rheumatic pains in the lower extremities. He then enjoyed tolerable health, but was unable to ascend a height or make any great exertion, on account of his respiration becoming thereby much obstructed. He spoke very indistinctly.

Jan. 5th, 1829.—Mr. Liston introduced a small gum-bougie from the aperture in the trachea into the mouth: this was accomplished with considerable difficulty, in consequence of the diameter of the canal above the opening being much diminished. With the view of allowing the more easy introduction of the bougie, the aperture was enlarged by the knife.

On the first introduction of the knife, the expirations became violent and convulsive, accompanied with nausea and profuse secre-

tion of saline. The instrument was allowed to remain for about three minutes. An hour and a half after its removal all irritation had subsided, and the patient regained his usual composure.

Jan. 28th.—He has a bougie introduced every third day: its introduction is accomplished without difficulty, and followed by no unpleasant symptom. On closing the aperture in the trachea, the obstruction of which used formerly to threaten instant suffocation, he is able to breathe freely for a considerable time. The size of the bougie has been gradually increased.

A long œsophagus-tube was introduced through the aperture in the wind-pipe into the mouth, and its lower extremity pushed downwards; so that it extended from the mouth to some inches below the aperture in the trachea. It was intended that this should remain for twenty-four hours; but the patient withdrew it three hours after its introduction, and refused to submit to farther treatment.

Some time afterwards he was persuaded to resume the use of the bougies; and the œsophagus-tube was again introduced, and retained for nearly twelve hours.

He became apprehensive of suffocation, and no intreaty would induce him to permit an attempt being made to close the aperture.

A hot wire was, however, repeatedly applied to the edges of the aperture, which was ultimately diminished to a small fistulous opening. The skin above and below the aperture was then divided by a longitudinal incision, and detached from the trachea. The callous edges of the aperture in the trachea were removed; and the integuments having been brought together, were retained by two stitches. The opening was thus, in a few days, completely and permanently closed.

He is still incapable of much exertion. His voice has become quite perfect, and his health is much improved.

The first case that has been recorded of a similar cure is published by Mr. Liston in the *Edinburgh Medical and Surgical Journal*, No. 94, page 118. In this instance an œsophagus-tube, about nine inches long, was retained in the wind-pipe for fifteen days; during which time the wound, a transverse one, was made to coalesce by approximating the raw edges, and afterwards by the use of a heated wire.

A few weeks since the woman presented herself at the hospital completely cured.

When agitated, or after sudden and violent exertion, her inspirations are a little longer than natural. Her respiration is otherwise free, and her voice quite perfect.

Edinburgh, June 17.

ST. GEORGE'S HOSPITAL.

Extensive Disease of the Arterial System.—Rupture of the right common Iliac Artery.—Peritonitis, &c.

On the 27th of May last, the body of Elizabeth Hancock, 60 years of age, was examined.

The right leg was swollen and pitted on pressure, and its two lower thirds presented patches of livid discolouration of the skin, which also extended in a slight degree along the front of the thigh to the groin. The appearance was not that of mortification, for the whole circumference of the limb was not affected, and the deeper textures were perfectly sound, with the exception of the subcutaneous cellular membrane, which was infiltrated with serum and a little pus.

Abdomen.—The peritoneum investing the liver, stomach, and indeed many other portions of the viscera, had shreds of coagulable lymph attached to it. There was no pus, little or no serous effusion into the abdomen, and the general peritonitis was but slight.

In the right iliac and inguinal regions, the pelvic cavity, and more especially on the right side of the latter, the inflammation of the peritoneum was more intense, and a couple of ounces of brown turbid fluid, apparently a mixture of serum and pus, had collected in the basin of the pelvis. In this situation the parts were all dark and modena-coloured, and on dissecting the peritoneum from the abdominal muscles in the right groin, portions of coagulum varying in firmness, and mixed with the products of inflammation, were discovered. This appearance on the outside of the peritoneum continued in the cup of the ilium, and particularly around the iliac vessels, which, in fact, were inclosed by a stratum of denser coagulum, equalling their own diameter. It was thought that there might be phlebitis, and the iliac vein was cut out to be examined, but the tube was free from any inflammation.

Attention was now attracted to a dark-coloured tumor on the sacrum, in the situation of the great vessels. The viscera were cleared away, and the aorta and vena cava exposed from the diaphragm to the termination of their iliac divisions. The vena cava was then slit up, and its cavity found to be perfectly free. The tumor noticed before was now clearly proved to be a continuation of that coagulum which had accompanied the iliac artery to the groin, and diffused itself in the iliac and inguinal regions. It was firm, not very recent, and closely invested the vena cava at its lower part, after which it passed over the right common iliac vein, in company with the right common iliac artery and its prolonged external trunk.

The vessels, with the coagulum around them, were removed from the body, and

carefully examined on the table. The aorta was universally diseased. In some places, patches of atheromatous matter, in others of cartilaginous, and in others, still more numerous, of actual ossific depositions, were found between the inner and the outer coats. The middle appeared to be the seat of the degeneration. Throughout the whole length of the tube, the internal coat was cracked and fissured in every direction, and the sharp osseous spiculæ projected into its cavity. In a number of places the external tunic alone remained to confine the blood. In the right common iliac, about half an inch from its origin, a nearly complete circle of osseous deposit reduced the calibre of the vessel to less than that of the superficial femoral in the middle of the thigh, and gave it exactly the appearance of a stricture. Immediately beyond this the artery was dilated into a pouch the size of a filbert, and it seemed to be somewhere hereabouts, though we could not precisely ascertain the spot, that one of the fissures in the vessel had given way, and the blood got abroad into the loose cellular texture external to the peritoneum.

All the branches of the abdominal aorta were diseased in the same way as their parent trunk. The kidneys were wasted; the liver was dark coloured; the stomach healthy; the intestines, externally, healthy also, but internally not examined.

Thorax.—The lungs and pleuræ were free from disease; the pericardium was natural, but its cardiac layer exhibited those white patches so frequently observed. The auricles of the heart were natural, and so were the parietes of the right ventricle, but its cavity was very small. The parietes of the left ventricle were upwards of an inch in thickness, its cavity remaining unaltered; in other words, it was hypertrophied without dilatation. The tricuspid and mitral valves were sound, the semilunar of the aorta were slightly indurated at their attached borders. The coronary arteries were extensively ossified, being reduced in more than one situation to a firm, bony, and contracted ring. The pulmonary artery was perfectly healthy.

The arch of the aorta presented, externally, a beautifully injected and arborescent appearance of its vasa vasorum. It was greatly dilated at its origin, and its branches, the innominate, left carotid, and subclavian, were also much enlarged in their calibre. The dilated part of the arch, which was also the injected one, was free from ossific or atheromatous depositions, and its internal coat was sound. The remainder of the arch, the branches, and the descending thoracic portion, were equally diseased, and in the same manner as the abdominal.

The head was not examined.

We have given the dissection first, because with that commenced our acquaintance

with the case, the previous part of which is involved in much obscurity. The patient applied to Mr. Cates only four days before her death, and we have been informed that the symptoms at that time were, vomiting; pulse small and weak; tongue dry and brown; expression of countenance anxious and typhoid.

Mr. Cates sent her into the hospital on the 25th, the second or third day of her illness, where she was visited and prescribed for by the house apothecary, Mr. Hutchins, in the absence of Dr. Chambers. She had now great tenderness over the abdomen; hot skin; pulse feeble, and 120; tongue dry and brown; teeth covered with dark sordes; bowels confined. The right leg and foot were the seat of dark erysipelatous inflammation, and purple vesications covered the inner ankle. Mr. Hutchins ordered,—

Hydrarg. Submur. Pulv. Ant. aa. gr. iij.
hâc nocte. Ol. Ricini, ℥iv. cras. totus
abdom.

26th.—Infus. Ros. ℥iss. Quin. Sulph. gr.
iss. Tinct. Op. ℥v. 4tâ quâq. hor.

Spir. Tenuior. ℥ij. Liq. Ammon. Acet. ℥iv.
Mist. Camp. ℥vi. M. ft. lotio cruri as-
sidue app.

In the evening a blister was placed on the abdomen, and an effervescing saline ordered to be taken every four hours.

On the 27th she died.

The dissection is interesting in several points of view. It shows how extensively diseased the arterial system may be, consistently with a tolerable performance of the vital and corporeal functions; and it illustrates a fact which we have often noticed, namely, the existence of hypertrophy of the left ventricle of the heart, along with disease of the coats of the blood-vessels. The smallness of the rupture in the common iliac will account for its not having killed *instantly*, by the sudden and profuse effusion of blood; and the greater consolidation of the coagulum immediately around the vessels, than of that in the groin and other situations, proves that the extra-sation was slow and gradual. Δ.

LADIES' LYING-IN INSTITUTION.

11, Grove-Place, 29th June, 1829.

SIR,

I OBSERVE in the London Medical Gazette of last Saturday, a copy of a prospectus of the BRITISH LADIES' LYING-IN INSTITUTION, in which my name appears as Consulting Surgeon. I shall feel much obliged if you will allow me to inform my medical friends, through the same medium, that my name was placed there through a mistake, and that I knew nothing of the *document* until I saw it, in an accidental manner, in print;

and that I am not one of the "we" who entertain such horrid notions of male practitioners in midwifery.

I am, Sir,
Your obedient servant,
JOSEPH HOULTON.

MR. COX'S CASE OF CONSTIPATION.

To the Editor of the London Medical Gazette.

SIR,

I MUST beg you to be so good as to correct an error, in the case of "Obstinate Constipation," inserted in the Gazette of last week; where, speaking of friction to the abdomen, instead of the words "from below upwards on the left side, and from above downwards on the right side," it should have been the very reverse; that is, *from above downwards on the left side, and from below upwards on the right side*; which, independent of the anatomical reason for so doing, could be the only way of performing the friction "in a circular direction," at the time the hand was passed across the abdomen from right to left above, and from left to right below.—I am, Sir, yours, &c.

W. COX.

London, June 25, 1829.

BOTANY.

Apothecaries' Hall, 26th June, 1829.

SIR,

I AM directed by the Master and Wardens to transmit to you the following extract from the Minutes of a Court of Assistants of the Society of Apothecaries, held on Tuesday the 23d instant.

I am, Sir,

Your very humble servant,
JOHN SAYER, Beadle.

"The Society of Apothecaries, anxious to promote the science of Botany, and more particularly that branch of it which is immediately connected with the study and practice of Medicine, have ordered that their Botanic Garden at Chelsea shall be opened on Friday the 3d day of July, 1829, between the hours of 9 and 11, and on every succeeding Friday, at the same time, until further notice.

"It is intended that admission shall be given to all such Medical Students as are pupils to the established Professors and Tutors in the metropolis, whether in Medicine, Chemistry, Materia Medica, or Botany. Such Students to apply at least three days prior, at the Beadle's Office, in Apothecaries' Hall, for tickets of admission for that purpose; which the Master and Wardens will grant to such persons as they may think proper.

"In order that the Master and Wardens may be enabled to exercise suitable discretion in granting such tickets, each Student

must leave with the Beadle a letter of recommendation from his Tutor, stating that such Student has been attentive to his studies, and is, in his opinion, desirous of improving himself in the Science of Medical Botany.

"It is ordered that copies of these Resolutions be forthwith sent to the respective Professors and Tutors in the branches of Medical Science above mentioned, containing a request that they will make the requisite communication to their pupils."

VOTE OF THANKS TO THE COURT OF ASSISTANTS.

At a meeting of the gentlemen attending the lectures of Jonathan Pereira, Esq. at the General Dispensary, Aldersgate-Street, on Tuesday, June 30th, 1829, for the purpose of considering the propriety of expressing their feelings on a communication made to them by him, announcing that the Court of Assistants of the Worshipful Company of Apothecaries would, under certain regulations, grant permission to Medical Pupils to visit their Botanical Garden, at Chelsea,

MR. WILLIAM PICKOP in the Chair,

It was resolved unanimously,

That the pupils of this class are deeply impressed with gratitude to the Court of Assistants of the Worshipful Company of Apothecaries, for the desire they have manifested to improve the professional education of medical pupils, by granting them (under certain regulations) the liberty of visiting the Company's Botanic Garden at Chelsea.

That the cordial and sincere thanks of this meeting be given to the Court of Assistants for so liberal and valuable an indulgence, and that a copy of these resolutions, signed by the pupils, be forthwith transmitted to them.

That a copy of these resolutions, signed by the Chairman, be also sent for insertion to the Editor of the *Medical Gazette*.

WILLIAM PICKOP, Chairman.

BOOKS RECEIVED FOR REVIEW.

Hints for the Examination of Medical Witnesses. By John Gordon Smith, M.D.

A Pocket Compendium of Anatomy. By Edward William Tuson.

A Practical Dissertation on the Waters of Leamington-Spa. By Charles Loudon, M.D.

Pathological Observations, Part II. By William Stoker, M.D.

The Influence of Climate in the Prevention and Cure of Chronic Diseases. By James Clarke, M.D.

Roberte Froriess, Med. et Chir. Doct. Commentatio de Lingua, cum xiii tabulis aeri incis.

Mr. Madden's Travels (see Analysis.)

W. WILSON, Printer, 57, Skinner-Street, London.

THE
LONDON MEDICAL GAZETTE,

BEING A
WEEKLY JOURNAL

OF
Medicine and the Collateral Sciences.

SATURDAY, JULY 11, 1829.

ON THE
INFLAMMATORY AFFECTIONS OF
THE BRAIN AND ITS MEMBRANES :

*Being the Substance of the Croonian Lectures,
delivered before the Royal College of Physicians,
in May 1829,*

BY FRANCIS HAWKINS, M.D.

Physician to the Middlesex Hospital.

[Continued from page 134.]

LECTURE II. *concluded.*

IN the remarks which have been made respecting the symptoms of arachnitis, we have in some measure anticipated that part of our subject which relates to the distinctions that, from the observation of a large number of cases, have been found to prevail, according as different portions of the arachnoid are the seat of inflammation. Now it appears that inflammation may occupy either that part of the arachnoid which covers the convexity of the hemispheres, or the part which lines the middle region of the base; or it may occupy the ventricles; or the whole arachnoid may be inflamed. And it has been found that to a certain extent the symptoms vary, according as each of these regions is principally affected. By the term arachnoid of the convexity is meant, not only that portion of the membrane which is spread over the upper surface of the hemispheres; but also that which covers the lateral parts, the base of the anterior and posterior lobes, and the posterior and upper surfaces of the cerebellum. By arachnoid of the base is meant that part which covers the inferior side of the middle lobe, the decussation of the optic nerves, the pons varolii, and medulla oblongata.

It appeared from the examination of 107 cases of arachnitis, from which the tables to which I have before alluded were calculated, that 25 of these were cases of inflammation of the base; 28 of inflammation of the base combined with that of the convexity; 52 of inflammation of the convexity; and that in 2 only the inflammation appeared to be confined to the membrane lining the ventricles.

Out of the 25 cases of inflammation of the base, 17 were children, and 7 adults. Out of the 28 of general arachnitis, 7 alone were children, and 21 adults; and out of the 52 of inflammation of the convexity, 6 only were children, and 46 adults.

Effusion into the ventricles had taken place in 21 of the cases of inflammation of the base, and was absent only in 4. 17 cases of general arachnitis were coupled with effusion, and 11 without. Of the 52 cases of inflammation of the convexity, there was effusion in 27, and in 25 no serum was found. There was effusion in both the cases attributed to inflammation of the ventricles; and of these one occurred in a child, the other in an adult.

If the foregoing calculations are at all deserving of credit, (and they would appear to be so, both from the circumstantial manner in which the cases are related, and also because many of them are drawn from various and independent authorities), the results which necessarily flow from them are these; that inflammation of the convexity is much the most common form of the disease in the adult age; and that inflammation of the base is far the most frequent form in children. Also, that effusion into the ventricles takes place

so much the more frequently and abundantly as the inflammation approaches nearer to the base; and hence it is most commonly met with in children: whilst in children, also, inflammation of the whole arachnoid is rarely found to occur.

When the *arachnoid* covering the *convexity* is inflamed, delirium is always present, which is not the case when the inflammation is confined to the base of the brain. The pathology of this symptom has been already spoken of, and a reason assigned for the disturbance of the intellectual functions being greater the nearer the disorder approaches to the convex surface of the brain. The delirium may vary in degree from a slight incoherence of ideas, with a tendency to loquacity, or a difficulty in expressing the thoughts, up to a state of perfect phrenzy. But there must always be some degree of disturbance of the intellectual functions, which is the constant, the diagnostic mark of this form of arachnitis. Having been most conspicuous during the period of reaction, it gradually ceases with the cessation of all intellectual operations, and passes into a state of coma. This state, as we have seen, is not necessarily connected with effusion, but as it doubtless is often caused by it, for that reason it would appear that it is an earlier attendant on arachnitis of the base than on that of the convexity. Whether the inflammation be confined to one hemisphere, or extend to both, the symptoms appear to be nearly the same, and pass equally through their three stages of headache, of delirium, and of coma.

In *arachnitis of the base* there is more of heaviness and stupor than of absolute delirium; and the tendency to stupor is observed particularly in children, perhaps because the superior energy of the brain in adults is capable of striving longer against it. In both, however, there are occasional returns of intelligence, so that the brain appears from time to time to recover its activity; and these remissions are most distinctly marked in children in whom the stupor is most profound. They are also particularly subject to spasmodic movements from the extreme irritability, as it would appear, of their nervous system; to which cause may also be in part attributed the strabismus, and other affections of the eyes, to which they in particular are subject. In

many respects arachnitis of the base is analogous in its symptoms, (except that it is more gradual in its progress), to the effects of sanguineous extravasations. It is also distinguished from arachnitis of the convexity by greater irritability of the stomach and derangement of the digestive organs. In children the disorder begins almost always with vomiting; and this symptom has been attributed by Dr. Monro, in his treatise on hydrocephalus, as well as by other writers, to the cause before alluded to; namely, inflammation of the origin of the eighth pair of nerves. The fluid which is collected in these cases at the base of the cranium may cause spasm and rigidity of the muscles of the neck, with a retraction of the head backward; and when effusion has taken place in the vertebral canal, the same symptom may be extended to the whole of the spine.

The number of cases is exceedingly small in which inflammation appears to have been confined to the *ventricles of the brain*. Effusion into the ventricles is often met with in conjunction with arachnitis of the convexity, and still more frequently with that of the base. In those cases in which it is found to have taken place without any marks of inflammation in other parts of the brain, it may often be attributed to an increase of exhalation, the origin of which is not inflammatory;—unless, indeed, unequivocal symptoms of inflammation should have previously occurred. In some rare cases it is said that the fine internal lining of the ventricles has been found to be greatly thickened. The symptoms which arise from inflammation in the ventricles appear to be precisely those which belong to arachnitis of the base.

General inflammation of the whole arachnoid occurs in adults, and is scarcely ever met with in children. It is almost needless to state, that it is characterized not so much by symptoms of its own as by a combination of all the symptoms which have been attributed to inflammation of different parts of the membrane.

Before we conclude our notice of the distinctions observed in the symptoms, according as different parts of the membranes are inflamed, a few words may be added on inflammation of the membranes which line the vertebral canal, or *spinal arachnitis*, a disease which

is very obscure; since, partly from the rarity of its occurrence, and partly from the difficulty attending morbid examinations of the spine, but few opportunities are afforded us of becoming acquainted with its symptoms or ascertaining its pathology. It appears to give rise to pain in the back, affecting principally the muscles on the posterior part of the trunk. Whilst arachnitis of the base of the brain produces rigidity in the muscles only of the neck, spinal arachnitis causes a general stiffness and curvature of the whole spine: hence it has been supposed to be the proximate cause of tetanus. But tetanus has existed when no appearances have been discovered to sanction this account of its pathology. Although it be true, therefore, that spinal arachnitis produces rigid spasms of the muscles, it cannot be the necessary and only cause of tetanus.

It may be remarked, that, in cerebral arachnitis, the intellectual functions are most disturbed, whilst the locomotive powers are affected only in the second degree: whereas, in spinal inflammation, the converse of this statement is found to prevail.

Arachnitis may be *complicated* with other disorders, either of the brain itself, or even of distant organs, by which its symptoms cannot indeed be changed, but may be sometimes masked and obscured. Not unfrequently it has happened that other organs have been affected in a grave and serious manner, although the existence of such affections had not been suspected in consequence of the arachnitis with which they have been complicated having so much impaired the sensibility of the patient, as that the pain, and other distinctive marks of those affections, had not been perceived.

At other times, on the contrary, it has happened that the symptoms of other disorders which have been complicated with arachnitis have become the most prominent, and have attracted the chief attention; and this will appear to be not unlikely to happen when it is considered that inflammation, arising in any other organ of the body, is capable, by a species of revulsion, of affording relief to the original inflammation in the membranes of the brain. Often when inflammation has occurred in the chest or abdomen, the disorder will appear to be anomalous in its

course, and attended with symptoms which are attributed to nervous sympathy. In many cases of this nature it has been found that arachnitis had been complicated with pectoral or abdominal inflammation. With the help of these considerations, we may be able to account for many of those cases in which the previous symptoms, compared with the appearances after death, would otherwise seem to offer contradictory results; for, however the disorders of other parts may be obscured by cerebral disease, or to whatever extent the former may in some instances predominate over inflammation of the membranes of the brain, yet it will be found that other disorders can neither borrow nor alter the peculiar symptoms of arachnitis, evinced as they are in the sensitive and locomotive functions; and it will be found upon closer observation, that these symptoms have, in fact, existed unchanged, though mixed and blended with the marks of other affections. Thus, for example, pneumonia, or peritonitis, cannot of themselves produce agitation, convulsions, or paralysis of the limbs; nor can rheumatism, though more likely perhaps than any other disorder to be confounded with the effects of cerebral disease, give rise to delirium, strabismus, or head-ache passing into coma.

The disorders independent of the head with which arachnitis is said, and I believe with truth, to be complicated more frequently than with others, are pleurisy, pericarditis, peritonitis, and affections of the synovial membranes; and there can be no doubt that this must be owing to the mysterious but well-established law which binds the serous membranes in sympathy together. It is also met with in conjunction with peripneumony and inflammations of the mucous membranes of the bronchial and alimentary canals; and is combined still more frequently with erysipelas and affections of the skin.

The affections referable to the head itself, which are met with in combination with arachnitis, are inflammation of the dura mater, extravasation of blood upon that membrane, apoplexy, encephalitis, softening of the brain, and scirrhus, tubercles, and other tumors: but of all the cerebral complications, that with softening of the substance of the brain is met with the most frequent-

ly. Yet the two disorders do not appear to be connected immediately as cause and effect; for the inflammation of the membrane, and the softening of the brain, so far from being in contact, may occur in opposite hemispheres. In cases of such combination, head-ache and delirium are the symptoms which indicate arachnitis; whilst the softening of the brain produces either rigid contractions or complete resolution of the limbs on the opposite side of the body, and sometimes convulsions on the same side on which it occurs. With apoplexy, neither arachnitis nor any other species of inflammation, in an acute state, is often found combined; but chronic arachnitis, by the alterations of structure which it produces, may prove to be itself a cause of apoplexy.

Such, then, are the cerebral or general disorders with which arachnitis is most frequently complicated.

It has been already mentioned that the delirium which attends arachnitis is not unfrequently interrupted by remissions. Independently, however, of this more usual course, it sometimes assumes a perfect *intermittent* form, inasmuch that it has even been mistaken for ague; and it is highly proper to be aware of this circumstance, because the mistake has led to erroneous treatment. The febrile paroxysms which attend this form of arachnitis, are capable of assuming a quotidian, tertian, or a quartan type.

Inflammation of the arachnoid, like that of the pleura, pericardium, and peritoneum, is sometimes said to wear a *latent* form. By this term is meant, that its commencement is too gradual to be perceived, until at length it suddenly becomes acute, and coma rapidly supervenes. Such an occurrence is, however, less common in the arachnoid than in the other textures of the same class, on account of the still more important nature of the organ which it invests. In cases of this nature the dura mater appears generally to have been first inflamed.

It is stated by some pathologists that arachnitis rarely passes into the *chronic* form, and that the appearances often met with on dissection, such as thickening and opacity of the membrane, are rather to be considered as remains of ancient attacks of the acute form of the disease than as proofs of the recent existence of *chronic* arachnitis: but,

from a comparison of the symptoms with the appearances after death, in the cases which have fallen under my own observation, I am inclined to believe that chronic arachnitis is by no means a rare disease; and I would appeal to any one familiar with dissection, whether the symptoms met with in habitual drunkards, such as heaviness, stupor, head-ache, delirium tremens, epileptic seizures, joined to thickening of the arachnoid, so common in such cases, do not almost confirm the notion that chronic inflammation of the membranes of the brain is a process in frequent operation. By some it is, with great probability, supposed that chronic arachnitis is a common cause of mental disorders. In a recent treatise by M. Bayle, on the *Maladies of the Brain and its Membranes*, it is contended that deranged intellect depends on a morbid state of the capillaries of the brain or its membranes. Nor is the opinion confined to himself, for the same has been maintained by Drs. Haslam and Marshall, and it may be collected from the writings of the older anatomists—Littre, Morgagni, Meckel, Greding, and the Wenzels. It is the opinion of M. Bayle, that chronic meningitis is essentially distinct from the acute form of the disease; that it always causes injection of the vessels of the pia mater, but that the arachnoid itself is never reddened: it is thickened, indeed, but not by the accretion of false membranes. He conceives that chronic meningitis is apt to give rise to that form of derangement which is termed monomania.

We have thus considered the *causes*, *pathology*, and *symptoms* of arachnitis; and have marked the distinctions which are found to prevail as different regions are the seat of inflammation; its complication also with other disorders have been described, and the various forms under which it sometimes makes its appearance. It remains to consider our means of combating this formidable disorder.

Although arachnitis, in whatever form it may occur, is a disorder highly dangerous to life, yet is it by no means necessarily fatal. Recovery has taken place after such unequivocal signs of its existence, and morbid examinations have so often confirmed the fact of its having previously existed, as to leave no doubt that this disorder may, in its

early stage at least, be treated with success.

To what remedial means has the recovery in such instances appeared to be owing?—to what but to the prompt and efficient administration of antiphlogistic remedies? And thus too epistaxis, or some other discharge of blood, has, in some cases, afforded relief through a critical effort of nature. If it be true that membranous inflammation in other parts of the body requires and admits of more active treatment than inflammation of the solid organs, arachnitis also should call for more decided depletion than almost any other cerebral disorder: and on this account it is desirable that its symptoms should be accurately distinguished, in order that it may be timely met, and opposed successfully.

In acute cases, there can be no doubt that bleeding should be instantly resorted to, and those methods adopted which are found to render its effect immediate and decisive—such as bleeding with a large orifice; and for the same reason it has been recommended that two veins should be opened at once.

When it is afterwards thought proper to resort to local depletion, and especially in cases of arachnitis of the convexity, there is no doubt that a good effect may be obtained from covering the whole scalp with leeches.

The remedies which may be ranked next in importance, are probably the application of cold to the head, and the use of derivatives. Blisters to the scalp are by no means generally approved, or not, at least, in the early period of the disorder; but in its subsequent stages there is less objection to their use, either in that situation or elsewhere. The fact that arachnitis has been sometimes relieved by the occurrence of inflammation in some distant organ, gives countenance to the use of sinapisms; and, contrary to the general practice, it is advised by some persons that they should be applied above the ankles, or to the knees, in order not only to avoid vesications of the extremities, but also to retain the power of using the pediluvium, which is itself of some service, and may be rendered more powerful by the addition of mustard, salt, or muriatic acid.

Of all external remedies, cold affusions are said to be the most effectual:

in France, Professor Recamier has strongly recommended their use in this disorder, and numerous instances are recorded of the decided influence which they have had in checking its further progress; but due regard should be paid to the cautions usually given respecting their administration, and they are inadmissible when the disorder is complicated with affections of the pleura, lungs, or heart, with those of the abdominal viscera, or with rheumatism. The effect which they produce is most decided when the disorder is at its height—that is, at the latter end of its first stage, or commencement of the second. From two to five minutes suffice for each affusion, and the first should be of short duration, in order to ascertain its influence.

In acute cases, Dr. Abercrombie recommends, as the most effectual mode of applying cold, that a stream of cold water should be directed against the crown of the head, and continued for a considerable time, until its full effect be produced. Applied in this manner, it is a remedy of such power that it requires to be used with much discretion. “Under the operation of it,” Dr. Abercrombie states, that he “has seen a strong man thrown, in a very few minutes, into a state approaching to asphyxia, who immediately before had been in the highest state of maniacal excitement, with morbid increase of strength, defeating every attempt of four or five men to restrain him. The following case,” he adds, “shews the immediate effect of it in another modification of the disease. A strong plethoric child, aged five years, after being for one day feverish, oppressed, and restless, fell rather suddenly into a state of perfect coma. She had been in this state about an hour when he saw her; she lay stretched on her back, motionless, and completely insensible; her face flushed and turgid. She was raised into a sitting posture, and, a basin being held under the chin, a stream of cold water was directed against the crown of the head. In a few minutes, or rather seconds, she was completely recovered, and next day was in her usual health.” The same remedy, he states, he is in the habit of using, with the best effect, in the convulsive diseases of children; and it appears to him to be much more useful in such cases

than the warm bath, the indiscriminate employment of which, he thinks, is often decidedly injurious.

In all forms of the disease, Dr. Abercrombie believes that active purging is the remedy from which we find the most satisfactory results; and he is convinced "that more recoveries from head affections of the most alarming aspect, take place under the use of very strong purging, than under any other mode of treatment." For this purpose he recommends the croton oil as the most convenient medicine.

With respect to the internal use of calomel, I find it recommended even by French writers as a purgative, especially in children: but if calomel, in repeated doses, combined either with antimony or opium, possess the power, as every day's experience convinces us that it does, of arresting febrile and inflammatory action, it should surely be administered *with this view* in arachnitis, and not for the *sole* purpose of acting as a purgative.

If opium be thought inadmissible when the tongue is furred and the skin is hot and dry, yet, after bleeding, or when combined with calomel or with saline aperients, its ill effects may be avoided, and great advantage may be derived from its use; and the same may be said of the judicious administration of other narcotic and sedative agents.

It has been stated, that the periodical remissions which occur in certain cases of arachnitis, have sometimes led to the administration of bark; and the relief which has *at first* been obtained from this practice has been attributed to the influence of a derivation of blood, or excitement of inflammation in some other organ. If this explanation appear problematical, yet it is certain that the relief from such practice has, in most cases, been only temporary, and the disorder has returned with aggravated force.

Two other modes of practice I find recommended by French writers; but I apprehend that they are too fanciful in their nature, and one of them attended with too much danger to admit of their being even tried in this country. One is the injection of emetic tartar in clysters, which Desant and Biehat termed an *heroic* remedy in arachnitis; the other, the compression of the carotid arteries, of the powerful effects of

which remedy a full account may be found in the 62d volume of the *Bibliothèque Medicale*.

In the treatment of chronic arachnitis, much stress has been laid on the advantages to be derived from issues and setons; but in too many instances these remedies have disappointed our expectations, and perhaps a repetition of blisters may be more efficacious, and not more harassing to the patient.

After what is commonly termed a brain-fever, we know how long the nervous system remains disturbed and irritable: with how much care, therefore, is it necessary to guard the patient, convalescent after arachnitis, from all external or internal causes which may excite a nervous system already too susceptible. He must avoid external heat, and stimulating food, and agitation of mind; in a word, every thing capable of quickening the circulation generally, or of determining blood to the head. Nor is he to be considered safe until he is not only free from pain and giddiness; nor when the natural and vital functions only, but when the intellectual also, have regained their usual standard; and, as a test of these, I would add, when the faculty of memory can be exercised with its accustomed freedom.

[To be continued.]

ABSTRACT OF A CLINICAL LECTURE

ON

FRACTURES OF THE LEG,

Delivered at Guy's Hospital, June 24,

By C. A. KEY, Esq.

I SHALL to-day found the observations which I shall make on the following case of compound fracture of the tibia, with fractured fibula:—

"Francis Miles, æt. 38, of good health and regular habits, admitted June 6th with a compound fracture of the tibia, about an inch above the ankle joint, in consequence of a fall seven feet in height from a house, and catching his foot in a tree in his descent. He was first seen by Mr. Chapman, of Tooting, who was unable to reduce the bone until he had removed by the saw about three-quarters of an inch of the upper portion. His leg was neatly and firmly secured by splints, bandages, &c. and he was

conveyed to the hospital. Mr. Key, finding the man suffering little or no pain from the straight position in which he was laid, did not remove the dressings in order to see the nature of the fracture and condition of the wound, as he was afraid, by disturbing the parts, of preventing the wound from healing by the first intention. The patient continued to go on favourably for four days, when finding the limb rather swollen and painful, Mr. Key removed the dressings. On examination the fracture was found to be oblique, and to have just escaped the ankle joint; the soft parts were in a sloughing condition for an inch round the injury, and the bone was deprived of its periosteum. In order to prevent the bone projecting inward, the position was changed from the heel to the side, with the knee bent, and the foot well supported on a splint. He found great ease from this change, and the bone maintained a good position. The separation of the sloughs was hastened by poultice and a better diet. The wound quickly improved—granulations sprung up, and seemed inclined to fill up the wound; but the bone is now (June 17) not quite in so good a line as Mr. K. wished, from the heel being drawn somewhat back; he therefore intends to place the heel on a long splint, and to keep up extension by the foot upon the lower portion. The leg is going on well.”

I shall take occasion to draw your attention, first, to the position adapted to fractured legs, as a point of first-rate importance in the treatment of severe and complicated simple fractures of the leg, but more particularly of compound fractures. The surgeon should, as far as he is able, at once judge what position is best adapted to the individual case, in order that he may not have to move the limb after it is once fixed in position. Rest, and the maintaining one uniform position, are both equally important: moving the limb increases the inflammation, and, in compound fracture, extends the suppurative process, by disturbing the soft parts. Were this the only evil, it might be compensated by the improvement in the position of the broken ends of the bones; but, unfortunately, the surgeon is surprised often to find considerable difficulty in altering their situation; after two or three days quiet in one posture, the muscles acquire a

certain fixed condition, which requires no small degree of force to counteract; and if it happen that, from negligence or want of skill, the fracture has been placed at first in a bad position, with a diminished length of limb, the evil is not unfrequently irreparable after a few days, from the apposition which the muscles make to a change of position. The effect of muscles in permanently shortening a limb, when not counteracted, I witnessed in the case of a fractured thigh, in which, from some cause, no measures had been taken to prevent the contraction of muscles, and retraction of the lower portion of bone. The man died in four days from another cause, and on inspecting the limb after death, the fracture was found to have taken place about one-third down the bone; the lower portion was drawn up into the obturator externus muscle, and it required more force than one person could exert to replace this portion in contact with the broken surface of the upper fragment. Every day's practice shews the importance of placing a limb at first in that position which it is intended to preserve during the treatment; the practice of allowing a limb to lie unconfined for a few days, from fear of increasing inflammation, or with a view of subduing spasmodic affection of the muscles, will materially add to the difficulty of “setting” the bones: procrastination is in this case not merely deferring the evil, but will in itself be found to be a frequent cause of difficulty in the reduction, which might not otherwise have existed.

The necessity for altering the position of the limb in this case arose from Mr. Key not having been acquainted with the precise nature of the fracture, nor with what had been previously done by Mr. Chapman. For the reasons above-mentioned he forbore to remove the dressings, or to examine the limb minutely.

You will readily, therefore, understand the importance of ascertaining the direction in which the fracture has taken place, and the manner in which the muscles are most likely to displace the bones; the superficial situation of the tibia renders such an examination easy, and the surgeon should not rest satisfied without acquainting himself with its nature.

In these diagrams you will see the manner in which fracture of the tibia

usually takes place, and I will explain to you, as far as experience has taught me, the mode of displacement usually attendant on them, and the treatment best adapted to counteract it.

From the manner in which the force is commonly applied in fractured tibia, we find the most usual direction of the fracture to be in a line passing obliquely upward and backwards, so that the upper fragment either protrudes directly forward, overlapping the lower, or has a somewhat oblique direction inwards, so as to form a projection on the inner side of the spine of the bone. Although these two kinds of fracture might seem to require similar treatment, yet in practice we find the same position not equally well adapted. In the former, when the upper part protrudes directly forwards, laying the limb on the outer side, in the manner recommended by Mr. Pott, is rarely found to answer the purpose of keeping the bone in a right line, more especially if the obliquity in the fracture be great; for the extensor muscles of the leg, acting upon the tubercle of the tibia, tend to draw the upper portion forward, and make it project beyond the lower. In this fracture maintaining a straight position of the whole limb will be found generally to answer best, with the foot resting upon the heel: if in this position the upper piece still appears inclined to protrude, it will be found to arise from the lower piece being drawn up against the upper, to prevent which, extension should be kept up by means of a foot-piece attached to an under splint: the action of the external gastrocnemius muscle may be counteracted by the support given to the heel. It is difficult to conceive how, in a fracture of this kind, occurring at the upper part of the tibia, the lateral position, with the knee bent, could be productive of any thing but deformity; but system was the fault of the age in which Mr. Pott lived, and the deformed tibiæ to be seen in every museum are so many testimonies of the mischief which a blind adherence to it may produce.

The case of the upper portion projecting, not as in the former, directly forwards, but inwards and downwards, overlapping the lower piece, and forming a distinct and visible projection on the inner side of the bone, will be best managed by laying the leg on the outer side, and giving efficient support to the

foot. When the fracture is not very oblique, this position will be found sufficient; but in a very oblique fracture the heel will be drawn back by the deeper muscles of the leg acting upon the foot, and no management in the lateral position can well prevent it. The lower fragment will also be drawn up so as to make the upper overlap, which cannot be rectified without extension of the foot. In this kind of fracture we shall commonly find that the position upon the heel is required, but not with the leg extended; the muscles of the leg are kept quiet by a semiflexed position, and their tendency to draw up the lower portion is diminished. Pressure, by means of a lateral cushion and splint, will sometimes assist when the obliquity of the fracture is very great; but it should be regarded only as an auxiliary, as the principal source of displacement arises from want of due extension by the foot.

A fracture of the tibia in the opposite direction often proves a difficult case to manage; I mean where the bone is broken in a direction obliquely backward and downward. The upper piece is, in this case, drawn backward among the deep muscles of the leg, and the fracture in this direction usually occurring high up in the bone, it cannot be much influenced by any well-directed attempt to replace it, from the little command the hand of the surgeon has over it. Position and extension are the only means that can be employed; flexing the knee relaxes the long flexors inserted into the upper part of the tibia, and prevents them from drawing the upper portion backward; while the extensors acting on the tubercle, being by this position somewhat put on the stretch, assist in drawing it forward. Much, however, may be gained by extending the lower portion, and preventing it from forcing the upper, back; for we find that in whatever position we place a fracture of this kind, without extension, some irregularity remains.

These are the most common fractures of this bone in which deformity is likely to ensue; but we find occasionally that even in transverse fractures an angular projection will take place, unless proper attention be paid on the part of the surgeon. When it occurs forward, it happens, I believe, generally from the leg having been placed on the outer side and the heel being drawn back-

ward; the fracture being transverse prevents overlapping, and the consequent change in position is a projection of the extremity of each end of the bone, forming an angle. This deviation from the straight line may be most readily obviated by placing the limb on the heel, when the tendency to it is observed. The opposite defect, in which the angle is formed at the back part of the bone, and the spine of the leg consequently assumes a concave appearance, arises from want of due support to the under part of the limb when it is laid on the heel: in this case, the side posture is a good one. I have known this deformity happen by a patient getting up before the new bone is consolidated, and bearing with his toe upon a sling, by which pressure he tilts the broken ends of the bone back, giving to the fore-part of the leg a hollow appearance. Such a defect I have seen occur subsequently to a man rising from his bed with a straight limb: it occurs usually to persons who, from some constitutional defect, have tardy union of fractures.

With regard to the instruments used for these fractures I need say nothing, as they are too well known to require description; nor have I any thing new to offer in the way of splints, as those commonly in use I find to answer their purpose both in the straight and in the bent or lateral position: but when extension is required, they are defective; so much pressure is necessary, in many cases, to prevent overlapping, that the patient is unable to bear it. Here the moveable foot-piece becomes useful, used either with Assalini's splint or with a thigh splint, such as was described when speaking of fractured thigh. To raise the limb, either pillows may be employed or the boxes with pegs, such as are in common use in our wards.

I am aware that, in compound fracture, there are some circumstances that must cause a surgeon to deviate from the practice which I have now recommended, and also to vary the position from that usually found best for a simple fracture.

The case I have shortly read, as a compound fracture, possesses some features which are worthy of notice. The first is the practice of Mr. Chapman, in sawing off the end of the protruding bone: it is a measure not only to be recommended as facilitating the

reduction of the bone, but also, in some cases, as a means of removing a future source of inconvenience. The surgeon has one of two alternatives when the bone is pointed and protrudes through a small opening—either to saw off the end of the bone or to enlarge the wound by an incision. Although the danger of a compound fracture is by no means proportioned to the extent of the external wound, yet the enlarging the wound gives us no advantage in the after treatment of the case, but may possibly add to the extent of inflammation. The removal of the end of the bone, on the contrary, is a positive advantage, for it frequently happens that the pointed extremity of the bone, when reduced, is not opposite to the wound, and thus acts as a source of irritation to the neighbouring integuments, and sometimes causes ulceration. If deprived of its periosteum, the bone sustains no actual loss, for the extremity will surely exfoliate, and the surgeon only forestals nature in the process of removal. I know of no objection to the practice; it does not shorten the bone, for it is only required in oblique fractures, and only a very small portion need be removed. Sawing off a portion of the entire calibre is objectionable, and in a compound fracture cannot, I apprehend, be often required.

The method of closing the wound, and endeavouring to place it in the condition of a simple fracture, as recommended by Sir Astley Cooper, seems to have been followed in this case. Its closure is more effectually accomplished by the simple application of a piece of lint steeped in the blood, than it can be by any other means, and without the irritating effects of plaster. Even if it does not entirely succeed in closing the wound, it disposes the deeper parts, that may be torn, to unite, and thus to limit the extent of suppuration; and this disposition may be encouraged by the application of cold lotions to the surrounding parts. Poultices are objectionable while there remains a chance of preventing or of limiting the suppurative process; they are therefore rarely applied in the first instance to compound fractures. The attempt at adhesion, when the integuments are much injured by the bone, or contused from any other cause, rarely succeeds to the full extent; the integuments either ulcerate or slough, or,

if much violence has accompanied the injury, so that the parts surrounding the bone are severely torn, it altogether fails. In the case of Miles, the former result has taken place, and the extremity of the bone is bared; but the exclusion of all sources of irritation by the treatment adopted has led to a very favourable progress in the wound towards restoration.

Its contiguity to the ankle-joint increases the danger attendant upon a compound fracture; more especially if the injury be so severe as to preclude the chance of obtaining adhesion of the wound, and thus preventing the necessity of a dangerous suppuration in the joint. Few constitutions are able to bear up against the irritation of this process; and in a case of complicated fracture, in persons past the middle period of life, when the joint is found to be opened, the question of amputation will be decided most frequently in the affirmative. I have known, however, the ankle-joint to have been opened by the tibia being split downward, in a case of compound fracture in an elderly man, in whom, at the end of the sixth week, amputation was performed on account of extensive abscesses, from which his health was declining. On examination, the fracture into the joint which had not been suspected, was found to have united as in a simple fracture, and the joint had a perfectly healthy appearance; while the bone above the joint, which was much comminuted, shewed no signs of union, being surrounded by pus. This proves that part of the fractured surface may unite by adhesion, while another continuous portion shall undergo the process of suppuration. It argues strongly for the propriety of endeavouring to obtain as much early union of the soft parts as we possibly can, as, doubtless, on their condition will materially depend the reparative process in the bone. By such means we may exclude a joint, which may communicate with the fracture, from the evils of suppurative inflammation.

The stage of inflammation preceding suppuration in the case of Miles has been marked by scarcely any constitutional irritation, and, as we might expect, the suppurative process has been characterized by little or no depression of power. The extent of suppuration, and its exhausting effects, are generally

proportioned to the previous excitement. An improvement in diet is all that he has required: being a man of moderate habits, he is allowed only a pint of porter.

The progress of this case hereby allows me matter for observation upon the effects of the suppurative process. This stage, under which even in my time our hospital patients in London used so frequently to sink, is one now comparatively of little danger, except in extreme cases: this is certainly as much owing to our improved ventilation, as to the improvement in our treatment. About four years ago, Sir Astley Cooper was desirous of knowing what proportion of our compound fractures we now lost; I collected 23 cases, occurring in about fourteen months, in Guy's Hospital, under my colleagues and myself, and out of these only three cases died. At present, we have two compound fractures of the thigh convalescent, in the accident ward. The suppurative stage is rendered tedious by circumstances. First, the improper management of the case during the inflammatory stage, by a bad position of the limb—frequently altering its posture; want of due support to the fractured bones to prevent them being disturbed by the spasmodic contraction of muscles; bad air acting upon an unhealthy constitution, rendering the powers of the system unequal to the task of reparation; small fragments of dead bone being cast off, and acting as sources of irritation. These latter are fruitful sources of mischief in the second stage of compound fracture: we find a patient, who had previously been going on well, suddenly becoming hectic, losing his appetite and rest, and complaining of pain in his limb; on pressing the part, some tender spot may be discovered, under which matter is confined, and on it being evacuated by puncture, a small piece of dead bone is discovered at the bottom of the abscess, which explains the previous train of symptoms: this being removed, he again recovers his tranquil state.

I had almost omitted what appears to me not to be an unfrequent source of extensive and copious suppuration; I allude to the prejudice existing in town against mild depleting measures in the early inflammatory stage of compound fracture. That copious depletion reduces the system, and renders the patient unable to support the irritative and exhausting effects of

suppuration, must be admitted to be just; but there is a mean between extreme and no depletory measures. By allowing the inflammation and the fever to run high, without having recourse to moderate depletion, do we not increase the subsequent stage of exhaustion and of suppuration? do we not observe generally exhaustion to come on rapidly after violent sympathetic or irritative fever, and in its degree to be proportioned to the active stage that has preceded it? Knowing as I do the ill effects arising from under depletion in this accident, I cannot but think that I have seen in town-practice, on the other hand, evil arise from the opposite extreme of allowing the symptoms to go on unabated, except by the aid of calomel and opium. Taking away a small quantity of blood, and employing mild purgatives, will shorten the first stage, and diminish the extent of the subsequent one. Of course, these observations apply only to robust habits, where the constitution is unimpaired, such as you meet with in country-practice.

At the end of three weeks, we find this man's leg with scarcely any union; whereas in a simple fracture we should have had firm, though imperfectly, ossified deposit. The tardy union in the former is owing to the process of granulation being necessary to the production of new bone; and another reason is the distance from the site of the fracture at which the ossific process commences. In simple fracture the opposed surfaces of the periosteum medullary structure and shell soon participate in the action, and the deposit becomes quickly ossified; in compound fracture the periosteum and bone immediately contiguous to the fracture appear to be devoid of action, for when you examine a bone in this state none is to be observed until you come to that part where the periosteum has been undisturbed: here may be seen spiculæ of bone shooting towards the fractured extremity, and from the increased distance the new bone has to traverse, the process of union must necessarily be slow.

PUERPERAL MANIA.

To the Editors of the London Medical Gazette.

GENTLEMEN,
BEING UNWILLING unnecessarily to force myself upon public notice, I have hesi-

tated during three or four weeks whether I should reply to a remark at page 51 of your journal for June 13, or no. It is almost a transcript of a paragraph in the recent admirable publication of Dr. Gooch, relative to puerperal mania. When I saw it in that work I was hurt, but determined to be silent: I am now constrained, by its reproduction in the Gazette, simply and briefly to contradict it*.

Dr. Gooch states—"Dr. Marshall Hall thinks that the susceptibility of the puerperal state is to be explained by mere exhaustion, and does not at all depend on the influence of any thing specific in the condition of the sexual organs at the time; but would an equal or greater degree of exhaustion, at any other time, occasion the disease? This is a question of fact, which I should determine in the negative†."

My reply consists in the mere quotation of the paragraphs to which this observation must refer, in my own work. They are these:—

"There is a mixed case, which shows itself under a still different form from any which have hitherto been described—it is puerperal mania. I believe this disease to result, in general, from all the circumstances following parturition combined, but chiefly from the united influence of intestinal irritation and loss of blood‡." "I am inclined to attribute much more to the combined influence of irritation and exhaustion than to the mere 'state of the sexual system, which occurs after delivery,' which has been assigned as the chief cause of this morbid affection by Dr. Gooch, in a most interesting paper on this subject in the 6th volume of the Transactions of the College of Physicians, page 180, although I would by no means exclude the influence of this principle altogether. There is ample evidence in Dr. Gooch's cases of the influence of intestinal disorder; and the events of labour, and the circumstances of lactation, ever add to this a state of exhaustion. This view is the more important, because it directly suggests the proper mode of treatment," &c. §

* The statement in the Gazette was simply an analysis of what was contained in the work of Dr. Gooch.—ED. GAZ.

† An Account of some of the most important Diseases peculiar to Women, by Robert Gooch, M.D. p. 128.

‡ Chapter iii.

§ Commentaries on some of the more important of the Diseases of Females, pp. 251-252.

I have been the more desirous of explaining this apparent discrepancy in opinion in Dr. Gooch and myself, first, because no *such* discrepancy exists; and, secondly, because I think it would be difficult to find any two works in the profession, written upon the same subjects, in which their respective authors had so observed the same things, and deduced the same conclusions, as in the works of Dr. Gooch and myself. Indeed, it has been no little flattering to me to have found the coincidence in our views so frequent—I had almost said, so constant.

I remain, Gentlemen,

Your obedient Servant,

MARSHALL HALL.

15, Keppel-Street,
July 4, 1829.

ON THE
CONSTITUTIONAL EFFECTS
ARISING FROM THE LOCAL IRRITATION OF
CARIOUS TEETH.

To the Editor of the London Medical Gazette.

SIR,

I ENTERTAIN the hope that you will deem the following remarks not unworthy of a place in your excellent Journal.

Mr. Koecker is, I believe, justly entitled to the merit of being the first who has satisfactorily proved and established the fact of the great morbid influence of diseased teeth upon the whole constitution, as well as on those parts of the system which are more immediately connected with them. My attention has, of late, been particularly directed to this subject, in consequence of reading Mr. K.'s excellent work on "The Principles of Dental Surgery," &c. and his "Essay on the Diseases of the Jaws," &c. In these works it appears to be throughout the particular aim of Mr. K. to impress this fact on the minds of his readers. Several cases illustrative of this fact have lately fallen under my notice, where patients have suffered from various constitutional maladies, and for which they have frequently sought in vain for relief, much more a cure, in consequence of the practitioner's not having traced the disease to its cause, although so extremely simple both in its nature and remedial means. I shall merely lay the follow-

ing case before the profession, and reserve several other cases for a subsequent occasion.

CASE.—Mrs. L—, æt. 28, of a very delicate constitution, was almost constantly suffering from such complaints as are usually classed under nervous and rheumatic affections. The least exposure to change of temperature produced a cold, followed by cough, sore throat, and violent head-ache. These repeated attacks produced great depression of spirits, and had so much effect in weakening her constitution, that, at the age of 28, her pale and emaciated countenance had the appearance of that of a person of 40. She was under my care for some time, but the usual medical treatment seemed to produce little permanent benefit; and knowing that her teeth were in a very much diseased, though not painful condition, I examined her mouth, and found, with few exceptions, that they were all either destroyed by caries, leaving only the dead and rotten roots or stumps, or that the crowns were so much decayed as to render their preservation apparently impossible. The gums were also inflamed, spongy, and suppurating in various places, and the breath was extremely offensive. I, therefore, insisted on a consultation with Mr. Koecker, who perfectly coincided with my opinion, that the diseased state of the teeth was the chief cause of all her sufferings, and proposed to restore her mouth to health in the first place.

The lady immediately acquiesced, and on August 8th, 1828, nineteen roots and teeth (all that required removal from the upper jaw) were extracted in my presence, and with so little suffering to the patient that she was willing to submit immediately to the same operations on the under jaw: this, however, by my request, was deferred for a few days. On the 14th, Mr. Koecker extracted eight roots and teeth from the under jaw. A very minute treatment was further adopted by Mr. Koecker, the particulars of which it is unnecessary to detail. It is sufficient to state, that, in less than three months, the remaining teeth—namely, six under front teeth (incisors and cuspidati), and the four dentes sapientiæ—as well as the gums and sockets, were rendered perfectly healthy by the judicious treatment adopted.

The improvement of the patient's general health also was almost daily visible, after the removal of the carious teeth; her spirits returned, her weakness and emaciation changed to the fullness of health and vigor, and her pallid countenance and aged appearance gave way to a fine healthy complexion.

Before concluding I ought to add, that Mr. Koecker has, in a most excellent manner, compensated the patient for her loss, by constructing a beautiful double set of artificial teeth.

I am, Sir, your obedient servant,
G. DOUCHEZ.

13, Air-Street, June 29, 1829.

ORIGIN OF MORBID FORMATIONS.

To the Editor of the London Medical Gazette.

May 26, 1829*.

SIR,

I SHALL not, on the present occasion, take up much either of your time or your space. "Fiat justitio, ruat cælum," has been a favoured motto in your columns: and I willingly adopt it to its fullest *moral* extent. You have, thus far, assisted me in the cause of justice and of truth, by putting on record in your valuable Journal, and by giving increased circulation to certain doctrines and views respecting a very important branch of pathology—namely, the nature of the origin and growth of morbid formations in the human body. I need not again, in this place, advert to the works I have already pointed out in my former letters: the references I made, and the rapid exposition, or (as you were pleased to call it) the *analysis* I then gave of Dr. Baron's statements and deductions, may amply suffice for my purpose. This was to lead the inquirer to sources of information, as I think, original, clear, and convincing. I have to express my regret, *en passant*, that your *running title* to my last article should afford even the semblance of having placed before the tribunal of the medical public two professional gentlemen, apparently on hostile ground, or in an unfriendly attitude towards each other. I believe that they would both deprecate such an

event most sincerely*. For myself, I am quite sure that my "loathing" of controversy is not less strong than that of Dr. Hodgkin. Indeed, no motive or consideration shall betray me into its miry arena. Happily, in this instance, I am not so called on. Dr. Hodgkin's paper, in your last number, has not touched a single position of mine, and scarcely even glanced at, much less upset, any *one* of Dr. Baron's pathological arguments; for, after all, the *pathological* view of the question is the only one he has thought worthy of being insisted on: and from this the magic illusion of the mere word *hydatid*, or the no less imposing designation (*acephalocystis*) of the *vermicular* entity, whatever *that* THING may be, can never dislodge him, standing, as he does, on the vantage-ground of accurate observation and correct reasoning.

Possibly, in his first work, Dr. Baron may have used the word *hydatid* in a way that Dr. H. may not approve. But if Dr. Hodgkin will kindly look at the "Delineations," published last year, he will find one of the illustrations, since selected by himself, described and represented in the clearest manner. I allude to the cysts connected with the uterine system. If Dr. B. and Dr. H. do not, in this instance, mean the same thing, there is an end to all controversy on the subject; if they *do*, who (I would ask) has been the first to trace the progress of these disorganizations? Be it farther observed, that Dr. Baron had no other object in view than to ascertain, first, the primary condition of those morbid growths; and, secondly, to trace their progress through the changes to their last fatal state. This his intention is clearly laid down, not in one passage only, but in an hundred, as, I believe, I may safely assert; and if we substitute the word "*process*" for "*progress*," it is the identical thing announced by Dr. Hodgkin himself. In prosecuting his investigations, Dr. Baron has employed facts and observations long known and recorded, but which were heretofore not applied to any useful purpose. How far he has done so successfully, time will shew.

It was very far from my intention to

* We have to apologize for the delay which has occurred in the publication of this letter. The truth is, that it was sent immediately after its receipt to the printer; but it having been found impossible to insert it in the then forthcoming Number, it was put aside, and escaped the Editor's attention.—ED. GAZ.

* In heading the papers "Dr. Baron v. Dr. Hodgkin," &c. we had no intention whatever of representing these gentlemen as *hostilely* opposed to each other; but to meet the views of our correspondent M. D. we have now changed the title. ED. GAZ.

throw out "insinuations," or to prefer "charges" against Dr. Hodgkin, either as a teacher or an author, still less as a member of a liberal profession: personally, I have not the happiness of his most distant acquaintance; and my knowledge of his acquirements and views on the subject at issue, as well as of the peculiar advantages under which his observations were made, is derived altogether from your own pages. From these, the *data* I made use of, *quoad hominem*, were taken; and I believe that I have neither misunderstood nor mis-stated him. Sure I am that, in his descriptive part, regarding the cysts and tumors of which he has already treated, he has figured out (if I may so speak) several of the identical morbid growths contained in Dr. Baron's works; and, farther, has employed the very terms, indeed almost the *ipsissima verba* of Dr. B., with the addition, it is true, of adventitious *serous* cysts, or "bladders." Between *these* last and all *other* encysted tumors, large or minute, Dr. Hodgkin insists that "a strong line of demarcation must be drawn, since they are essentially different from each other." Yet I have no hesitation in saying, that all his descriptions of these "serous cysts," and "the characters of the structures they constitute," go to prove their similarity.

To conclude: I cannot, Sir, nor will you, I think, concur in Dr. Hodgkin's assertion that my remarks contain, or even imply, "imputations unjust or ungenerous." I aimed at an object *equitable* in itself and *open* to all. If, in so doing, I have wounded fair and honourable feelings, I shall deeply lament "that I have shot the arrow o'er the house, and hurt a brother." One great and good result, however, is certain—*MAGNA EST VERITAS ET PRÆVALEBIT*. This consummation, so devoutly to be wished for, will perhaps be hastened by the outcoming publication of Dr. Hodgkin, on these "adventitious formations." Could that subject have received any additional illustration from the blazonry of my name, it should have been given: for the present, however, I deem it right to maintain my humble *incognito*. To you, Sir, I shall not appear an anonymous correspondent, although I continue to subscribe myself

M. D. OXON.

REMARKS ON THE TENDENCY
TO
CALCULOUS DISEASES;

With Observations on the Nature of Urinary Concretions, and an Analysis of a large part of the Collection belonging to the Norfolk and Norwich Hospital.*

BY JOHN YELLOLY, M.D. F.R.S. &c.

PART I.—*Of the Tendency to Calculous Diseases.*

FROM the establishment of the Norfolk and Norwich Hospital in 1772, to the end of last year, making a period of fifty-six years, 649 operations of lithotomy have been performed in it, which is at the rate of rather more than $11\frac{1}{2}$ per annum, and about one in forty on the total number of admissions, which amounted, at that period, to 26,521 †. If we deduct from this number the cases which have come from Suffolk and Cambridgeshire, amounting to 74 (of which, however, only a single instance has occurred from the latter county), there will remain 575 furnished by the population of the county of Norfolk, which amounts to 351,000; and this will produce about 10.26 cases per annum, or one for every 34,000 inhabitants.

The number of cases arising in Norwich ‡, in the same period, is 128, or about one-fifth of the whole; while 447 are derived from the county of Norfolk, independently. Norwich, therefore, which contains 50,000 inhabitants, furnishes annually 2.28 cases on its population, or one for every 21,000 inhabitants; while the other parts of Norfolk afford only 7.98 per annum on their population of 301,000, or one for every 38,000 inhabitants, which is not much above one half of the proportion of Norwich. Considerable differences likewise exist with regard to the ratio of numbers furnished by the different hundreds of Norfolk; the eastern parts

* Condensed from the Philosophical Transactions.

† The hospital contains about 100 patients, and averages about 80. I have adopted the census of 1820 in my calculations, and have usually put aside the hundreds.

‡ With Norwich I include, as is usual, what is called the county of the city of Norwich, a district which extends, in one direction, about two miles from the city, and in the others, from half a mile to a mile.

of the county, however, contributing more largely than the western. Thus the six western contiguous hundreds, including Lynn, have furnished not more than one-half of the proportion of the six eastern hundreds, including Yarmouth; and the difference is still more striking with regard to some of the individual hundreds; for the hundreds of Taverham, Tunstead, and Walsham (contiguous hundreds on the eastern parts of the county), have regularly furnished about five times the proportion of the contiguous western hundreds of Freebridge Marshland, Freebridge Lynn, and South Greenhoe; which proportions have been pretty much preserved, during every part of the period to which the records of the establishment extend.

It is to be observed, however, that there are some singular anomalies on this subject; for in a few instances it has happened, that a particular hundred has been remarkably free from the disease, and that the contiguous one has afforded rather an unusual number of examples of it.

There has been no material alteration in the number of cases which have occurred, in a similar space of time, during the different periods since the establishment of the Norfolk and Norwich Hospital; and hence, as the population of the county has augmented nearly a third during that period, the proportion of calculous cases may be considered as having diminished much in the same ratio.

With regard to the proportion in which calculous cases occur in other parts of the kingdom, the researches of Dr. Dobson*, and afterwards of Dr. Marcet†, and Mr. Smith of Bristol‡, have communicated the principal information which we possess upon the subject: but it is exceedingly difficult, from the want of efficient registers, to procure such data as can connect the occurrence of a certain number of cases with a certain known population. Mr. Smith's calculation, of the occurrence of about 47 operations for calculus annually in the hospitals of the metropo-

lis, I believe to be pretty nearly the truth; and I have found from the registers of the London Hospital (to which I was many years physician), that in that establishment about two-thirds of the calculous cases have been furnished by the metropolis and one-third by the country. Taking the same proportions as applying to the other hospitals of the metropolis, I am therefore disposed to refer 31 of the 47 cases to the population of the metropolis, amounting to rather more than 1,200,000 inhabitants; and 16 to about the same number living in counties adjacent to the metropolis, which possess no county hospitals, or have had them too recently established to effect the calculation*. It would seem probable from this rough estimate, that one case of operation for calculus occurs annually for every 38,000 inhabitants in the metropolis, and about half that proportion in the counties contiguous to it.

From the information which Mr. Smith has furnished, it appears that about 60 operations of lithotomy are performed annually in the provincial hospitals of England. This estimate includes Wales, whose sick poor, when sent from home, are chiefly transmitted to the hospitals of one or other of the adjoining English counties, as there are no such charities in the principality. Suffolk did not possess a county hospital when Mr. Smith was prosecuting his researches, and consequently was not included in his calculations, except as far as it furnished cases to the Norwich or other hospitals. It possesses, however, in an eminent degree, the calculous character of Norfolk; and I have been enabled, through the kindness of some professional friends, to estimate the operations of lithotomy performed in it, by private practitioners, during the last twenty years, as about four annually. If this number be added to 1.26 (which is the annual proportion of 73 admissions from Suffolk to the Norwich Hospital in 56 years), we shall have 5.26 cases as the annual product of Suffolk on its population of 234,000; or one case for every 44,000 inhabitants. It may be remarked, that the want of an hospital in Suffolk, till with-

* Medical Commentaries, &c. with Observations on the Disposition to the Stone in the Cyder Counties, compared with some other parts of England.

† Essay on the Chemical History and Medical Treatment of Calculous Disorders.

‡ A Statistical Inquiry into the Frequency of Stone in the Bladder in Great Britain and Ireland. —Medico-Chirurgical Transactions, vol. xi. p. 7.

* Middlesex, Essex, Surrey, and Herts, may be regarded as hitherto principally dependent on the metropolis for hospital accommodation; Kent, Sussex, Bucks, and Berks, as only partially so, perhaps to half their demand.

in these few years, and its distance both from Norwich and London, have occasioned the performance of a much larger proportion of operations of lithotomy in that county, by private practitioners, than is usual in other districts.

According to Mr. Smith's calculation, there will therefore be 107 public operations in the whole of England and Wales, which, with the addition of four from Suffolk, will make 111 operations annually, on a population of very nearly 12,000,000, or one case for every 108,000 inhabitants. This, however, is not quite a third of the proportion which occurs in Norfolk.

If we put aside from the calculation, the $15\frac{1}{2}$ cases occurring in the Norfolk district (comprehending Norfolk and Suffolk), with its population, we shall then have one calculous case for every 118,000 inhabitants, independently of that district. But if we further remove the cases which occur in London and the adjacent counties, with the respective population connected with them, we shall have not more than 49 examples of calculus attaching to the whole remaining population of England and Wales, or one case only for every 188,000 inhabitants, which is little more than one-fifth of the proportion of London, and of the Norfolk district excluding Norwich; and only about one-ninth of the proportion of Norwich itself.

The tendency of any particular class of persons to be afflicted with calculous complaints, in the kingdom at large, must therefore be exceedingly small. But if we take individuals between 14 and 50 (which is the most extended period of active exertion in adult age), the calculous cases will be still further reduced; for though it appears by the population returns, that nearly one-half of the whole population of the kingdom consists of persons between those ages, yet the calculous cases belonging to this period of life, as inferred from the Norwich register, are not quite a third of the total number. Under these considerations, I feel some degree of difficulty in completely assenting to the opinion which Mr. Copland Hutchison so ably supports*, of

a sea-faring life being remarkable for the comparative infrequency of urinary calculi.

In the Norwich, as well as the London Hospital, the liability to calculous diseases has been nearly as great, during the first sixteen years of life, as in the whole after period; but if we take the cases afforded by Norwich and London, independently of their respective country districts, as many cases of calculus have occurred below 14 as above that age; so that in those two instances, the proportion of children affected with this complaint (judging from the hospital returns) has been larger in a town than in a country situation.

With regard to the mortality from the operation of lithotomy, the number of deaths in the Norfolk and Norwich Hospital has been 89, which is a mortality of one in 7.29 cases, from the institution of the charity. But it is creditable to the state of modern surgery, and to the skill of the present surgeons of that hospital, that, in the operations performed by them (which amount to near one-third of the whole number from the commencement), the proportion of deaths has been reduced to one in 8.42, which differs very little from the average of Cheselden, whose improved lateral operation they follow.

Up to the age of 14, the deaths are only one in $14\frac{1}{2}$; and above that age, one in $5\frac{1}{4}$. Between 14 and 40, the mortality is one in $10\frac{1}{2}$; but after that period of life, it is augmented to the formidable extent of one in $3\frac{3}{4}$.

The number of female cases, in the whole, has been 31; the proportion, one in 20; and the deaths, one in $15\frac{1}{2}$. But from the improved practice by dilatation, all risk of life, in the abstraction of calculi from females, seems to be taken away. I have mentioned, in the *Medico-Chirurgical Transactions*, the removal from a female of a calculus of nearly $3\frac{1}{2}$ oz. troy, in weight, by spontaneous dilatation*; and some examples are given in the *Philosophical Transactions*, by Dr. Molyneux, Dr. Heberden, and others, of a similar kind: but it was not till of late years that dilatation was employed to supersede the usual operation of lithotomy in women.

The operation of lithotomy is always attended with more danger when

* On the Comparative Infrequency of Urinary Calculi among Sea-faring People.—*Medico-Chir. Transactions*, vol. ix. p. 443.

calculi are large than when they are small. This has been strikingly exemplified at Norwich; for of 52 cases of adult males, in which calculi of 2 oz. or more occurred, 31 died, or nearly two in three; while in 282 cases, also of adult males, in which the stones weighed less than 2 oz., the mortality only amounted to 37, or rather less than one in seven. Part of this unfavourable issue is, no doubt, to be attributed to the injury, both local and constitutional, which the long continuance of a large calculus in the bladder may occasion; but, at the same time, when we consider the general hazard of the operation of lithotomy, even in the most skilful and experienced hands, and the injury produced by the force necessary for extracting a calculus, and particularly a large one, there is a strong inducement afforded, to the full and dispassionate examination of the mechanical means which have been suggested, either for diminishing the magnitude of calculi, during an operation, in the revived and improved method of Mr. Henry Earle*, or for wearing them down, by slow and gradual detrition, according to the plan which has been employed at Paris by M. Civiale, so as, in many cases, to do away with the necessity of the operation altogether†.

The circumstances which occasion death after the operation of lithotomy, form an important and interesting subject of investigation to the surgeon; and I am inclined to think, that, in addition to the unforeseen and unavoidable occurrences which sometimes succeed the very best exertions of surgical skill, there is something to be attributed to the constitutional shock of a great operation, under which the system will occasionally sink. It is, however, a consideration that may abate undue confidence, from early success, on the one hand, and offer consolation and encouragement, under unexpected failures, on the other, that of two of the most distinguished contemporary lithotomists of this country, whose qualifications were of the most respectable kind, one lost three patients only of his first 50 operations, or one in 16 $\frac{2}{3}$; and one in 4 $\frac{3}{4}$ of the remainder, amounting to more than double, so as to reduce his average mortality to rather below one in seven;

while the other lost 11 of his first 50 patients, or one in 4 $\frac{1}{2}$; and in his remaining cases, which a good deal exceeded those in the former instance, lost only one in 13 $\frac{3}{4}$, so as to render his whole average mortality rather less than one in eight.

Recurrences of stone seem to be not very frequent; fourteen instances, or one in forty-six only, being found in the records of the Norfolk and Norwich Hospital, of the operation having been performed twice on the same individual: three were below 14, and nine (of whom two died) above that age. The production of the second calculus took place, in four of these cases, within one year; in five, within two years; in three, within three years; while in the two remaining cases, the operation did not become again necessary till after a lapse, respectively, of seven and ten years.

It does not appear that a second calculus is necessarily of the same character as the first. In the child from whom the first known specimen of cystic oxide was extracted (that analysed by Dr. Wollaston), the disease returned; but a second operation was not submitted to. The child died, when a calculus, of a different character from the original one, was found in the bladder.

A curious example, of a similar kind, was shewn to me at Cambridge, by Mr. John Okes, one of the surgeons to the Cambridge Hospital, of a calculus of cystic oxide having a lithic nucleus, which was removed from a boy of four years old, and was followed, in a short time, by the formation of another of fusible exterior, with a lithic interior, which made a second operation necessary in less than a year from the first. So speedily may the character of the animal process be changed, on which the formation or augmentation of urinary concretions depends.

With regard to the respective number of calculous cases which occur among the lower and higher orders of society, it is necessarily very difficult to obtain any correct information. Mr. Martineu, however, the senior surgeon of the Norwich Hospital, one of the most eminent and successful lithotomists of the present day, laid before the public, some years since, with much valuable information on the subject of lithotomy, a list of private patients, amounting to ten in number, upon whom he operated,

* Med.-Chir. Trans. vol. xi. p. 69.

† De la Lithotritie, ou Broiement de la Pierre dans la Vessie.

during a period that he operated on 111 public patients*. The proportion was one private patient to eleven public; which differs not much from the results of the late Mr. Brandon Trye, of Gloucester, as given in Mr. Smith's paper.

I regret that but little advances have been made in a knowledge of the circumstances on which a tendency to calculous complaints depends; and I am not aware of such differences of air, water, soil, or habits of life, having yet been detected, as can justify us in attributing the prevalence of stone, in the Norfolk district, to any of those causes.

A constitutional predisposition to the occurrence of calculous diseases unquestionably exists in certain families. Dr. Prout, in his valuable work on Urinary Diseases, mentions an instance of a calculous tendency in three continuous generations; and I am acquainted with a family, where the grandfather, a man of active habits living in the country, was twice cut for the stone, and died from the second operation; the father was also cut; and two of the sons have exhibited an unequivocal calculous disposition, from an early period of life. I may also observe, that a few examples have occurred at the Norfolk and Norwich Hospital, where more than one individual of a family has had the disease, and undergone the operation.

The large employment of ill fermented farinaceous food, which marks in some degree the habits of the commonalty of Norfolk, may perhaps be regarded as favouring the occurrence of calculous diseases; but a much coarser and worse fermented material, in rye, barley, oats, and various mixtures of peas, with wheat or barley, has been, and perhaps still continues to a certain degree, in use in Scotland and the North of England, without being productive of such an effect. There are doubtless, however, various collateral circumstances that have not been sufficiently ascertained, which may have the power of modifying the effects of any particular description of food; and it is even very probable that the laxative tendency of some of the coarser kinds of farinaceous aliment, may have a salutary influence, and obviate the disadvantages which might otherwise arise from their employment.

The eyder counties were at one time

supposed to be peculiarly liable to calculous complaints; but so little ground is there for this opinion, that Herefordshire seems to have a very peculiar exemption from that malady; and Devonshire not to have more than the average cases of other counties.

From the documents to which I have referred, it appears that the tendency to produce calculus is much greater in Norwich and London than in their respective country districts. The same circumstance is very strikingly exemplified in Bristol; for according to Mr. Smith's paper, to which I have had occasion so frequently to refer, 354 calculous cases have occurred in 82 years, at the Bristol Hospital, which is at the rate of 4.3 per annum. But of these, 173, or very nearly one-half, were derived from Bristol and its liberties, which comprise a population of 87,000 persons; and 181 only from the neighbouring districts, containing not less than 750,000 inhabitants. The annual proportion would therefore be not less than 2.1 per annum for Bristol, which is 1 for 41,000 inhabitants; while in its extensive and populous country district, the proportion would not be more than 2.2 per annum, or 1 only, for every 340,000 inhabitants.

In some parts of the country districts of Bristol, there are very singular anomalies; for the town of Chippenham, with only 3200 inhabitants, is stated by Mr. Smith to have furnished as many cases of lithotomy as the whole remaining county of Wilts. On the calculation of 18 cases in 82 years, or 1 in 4.5, which is about half the amount furnished by Wilts, there would, in this little town, be a tendency to calculous complaints exceeding, by about a fourth, that of Norwich itself.

Scotland is generally regarded as but little liable to the production of calculous diseases; and if Mr. Smith's calculation of the occurrence of eight cases only per annum, in that part of the island, is a correct one, it would, on its population of two millions, be in the ratio of one case for every 250,000 inhabitants. But the town of Dundee, in the county of Forfar, with a population of 30,000, has afforded to Mr. Crichton, of that place, in 36 years, 31 cases of stone, out of about 70 on which he operated during that period*. This is at the rate of .85 per annum, or one for

* On Lithotomy.—Medico-Chir. Transactions, vol. xi. p. 402.

* Observations on the Operation of Lithotomy.—Edin. Med. and Surg. Journal, vol. xxix. p. 225.

every 35,000 inhabitants, if they had extended to that number. But if five are deducted, as having, from their designation in Mr. Crichton's list, the appearance of belonging to a higher class of society than enters into the calculations of this paper, we should then have .72 per annum, or one case for every 41,000 inhabitants, which is about the average proportion of Bristol.

[To be continued.]

ANALYSES & NOTICES OF BOOKS.

“ L'Auteur se tue à alonger ce que le lecteur se tue à abrégér.”—D'ALEMBERT.

Elements of Medical Statistics; containing the Substance of the Gulstonian Lectures delivered at the Royal College of Physicians. By F. BISSET HAWKINS, M.D. of Exeter College, Oxford, &c. 8vo. 1829.

To the readers of this journal, Dr. Bisset Hawkins needs no introduction, as he must be favourably known to them as the author of a series of very interesting lectures on Medical Statistics, published in our first volume. Since that time the author has continued his researches with extraordinary zeal and industry, and the result is, a work containing much very valuable matter with regard to the duration of human life in every quarter of the globe, and even in all the individual cities of any considerable size.

The mortality in Great Britain is first considered, and afterwards that in other countries. In 1780 the annual deaths in England were 1 in 40; in 1821, when the last census was taken, they were only 1 in 58. In Sussex the deaths are only 1 in 72; in Middlesex, 1 in 47. But it is impossible for us to enter upon a subject so extensive; indeed there is no work in Europe which takes so wide a range as the present; and its value as a book of reference is thus proportionably increased. The subject is new—at least its cultivation is as yet but in its infancy; for, though abundant detached documents exist relative to particular points, no attempt of a successful kind has hitherto been made to generalize them. Yet there is no inquiry of more general interest; for, besides the light which it must

throw upon medical science, it also tends to illustrate the history of the world, by bringing before us the manners and customs of different nations, and their effects upon the human constitution; effects which appear to be always influenced by the progressive or retrograde movements of society. The work, we are confident, will become one of standard authority in political medicine, and we trust that the author will obtain from it the reputation to which the successful accomplishment of so useful and laborious an undertaking entitles him. While we refer to the work itself for the details, it will afford our readers satisfaction to learn, as the general result, that England stands pre-eminent for her superior salubrity—much as we hear of the smoke of her cities and the fogs of her atmosphere.

“ It is indisputable that the average proportion of deaths in England and her cities is less than that of any other country of Europe. And it may be added, that the powers of body and of mind are preserved to a late period in higher perfection here than in other countries: nowhere are the advances of age so slowly perceived, and nowhere so little manifested on the exterior. An analogous condition of health and vigour may be also observed in our animals and in our vegetation; and if it should be replied, that this excellence is owing to the care bestowed on their culture, the answer applies equally to the human being, on whom more attention is here bestowed, and who is really an object of greater value here than elsewhere.

“ If political and moral circumstances actually possess so preponderant an influence on the production of disease, and on the guidance of its fatality, it seems to be incumbent on our profession to study their progress, and to profit by their results. A peculiar set of diseases appears to belong to every age, and it may be almost affirmed, that there is also a mode of treatment adapted to every age. But the science of medicine, purified from obsolete mysteries, no longer idly promises to extend existence beyond the term originally assigned to it, and only endeavours to conduct the feeble and the unfortunate in safety to the natural boundaries of their present being. And altogether we must conclude, that the

causes which shorten life are generally those which render it miserable; and that wherever a people enjoys a higher degree of prosperity, of rational freedom, and of moral dignity, there also will a greater number of individuals reap the full harvest of their years.

[To be continued.]

ANALYSES OF BRITISH MEDICAL JOURNALS.

EDINBURGH MEDICAL AND SURGICAL JOURNAL.

1st July, 1829.

Art. I.—*Reports on the Diseases of Plymouth.* By EDW. BLACKMORE, M.D.

THIS is a very elaborate paper, comprising a number of curious calculations of much interest in a statistical point of view. Tabular views are given, illustrative of various circumstances connected with the comparative degrees of frequency and rates of mortality of different diseases as they occur under different circumstances. The first of these, in the present paper, shews the relative frequency and mortality of some of the most important diseases at various periods of life in either sex. The following is a summary of the results obtained by the author:—

“*Anasarca* is more prevalent in the adult, as 196 is to 50, or nearly as *four* to *one*. It is of high relative mortality in the young, probably as being always symptomatic and secondary on serious internal disease. The most diseased age is from 50 to 60; the most mortal *absolutely* from 20 to 30; the most mortal *relatively* from 40 to 50.

Ascites. Inasmuch as the total of the adults is double that of the young, it is requisite to double the number of the young in the several sections of the columns of totals in this table, in order to find the exact ratio, *e. g.* in the present genus, $6 \times 2 = 12$ to 26. *Ascites*, then, is chiefly a disease of adult life, but rather more mortal in the young, namely, as 2.8 is to 2. This may happen from delicacy of tissue in the young, in consequence of which the ravages of disease are ill repaired; except, indeed, in the case of surgical maladies from external violence, in which reparative action in the young is wonderously luxuriant. The most diseased age is from 30 to 40.

Asthma or *Dyspnœa* is nearly four times more frequent in the adult than in the young, and it is also more mortal. It is more mortal in the adult male than in the female. The most diseased age is from 50 to 60; the most mortal from 40 to 50.

Apoplexy is almost entirely a disease of the adult, for the slow and gradual *coma* which is the sequel of phrenitis or encephalitis in the young, is not exactly apoplexy, which term I confine to the instantaneous disease. It is singularly more mortal in the male than in the female.

Carditis is three times more prevalent in the adult than under puberty. Its high relative mortality in the young shows how much the rapidity of the pulse, which is characteristic of this age, affects the progress of diseases of the heart. The most diseased age is from 40 to 50; the most mortal relatively is from 30 to 40.

Convulsions are eight times more prevalent in the young; and more mortal in the female than in the male child, from her greater sensibility and irritability of texture. The most mortal and diseased age is the first year.

Catarrh is of much greater frequency and mortality in the young. The most diseased and mortal age is the first year.

Enteritis is nearly three times more frequent in the young: of nearly equal mortality in the young male and female, but more mortal in the adult male, as 10 to 7. The most diseased and mortal age is from 2 to 5.

Cholera, *Dysentery*, and *Diarrhœa*, are three times more prevalent in the young; less prevalent, but more mortal, in the young female than in the male. In these relations it accords with *Catarrh*, showing that mucous diseases have a particular alliance with the age of childhood and the female sex. It is, however, less mortal in the adult female than in the male, as 27 to 9. The first year is the most diseased and mortal age.

Dyspepsia is almost entirely a disease belonging to adult life: of course the instances of innocent vomiting so frequent in sucking children are omitted. The most diseased age is from 30 to 40.

Epilepsy is more than twice as frequent in the adult as in the young. This genus is far less connected with disease in the adult than in the young, from the more vivid sympathy which exists among the several parts of the nervous

system in the latter class. Hence its low mortality. The most diseased age is from 20 to 30.

Erysipelas is very little incident to the young. The most diseased age is from 30 to 40.

Fever is of considerable prevalency in the young; but that the majority of fever cases happens in them I presume to be an error. Probably many cases here marked fever belong truly to the genera *gastritis* and *enteritis erythematica*. It is of much smaller mortality in the young than in the adult, which I think shows the close connexion of fever with the *nervous system*, the disorders of which are much augmented by the extreme exhaustion of this system by the labours and cares of adult life. It is more mortal in the young female than in the male, as 77 to 27; but less mortal, though more prevalent, in the adult female, as 21 to 9. The most diseased and mortal age is from 20 to 30.

Gastritis is a little more prevalent, but far less mortal in the adult than in the young; and far more mortal in the young female and the adult male. The most diseased age is from 20 to 30.

Hepatitis and *Icterus* are three times more prevalent in the adult than in the young; doubly more prevalent, but far less mortal, in the adult female than in the adult male. The most diseased age is from 20 to 30.

Measles is nearly altogether a disease of the young. The most diseased age is from 2 to 5. The most mortal is the second year.

Hydrothorax and *Hæmoptoe*. There is here indicated too small a proportion in the young, from defect in the journals. The most diseased age is from 30 to 40; the mortal from 40 to 50.

Pneumonia is only a little less prevalent in the young than in the adult, namely as 5 to 6.5. It is less mortal in the latter. It is more prevalent as well as mortal in the young male than in the female. Its rate of prevalency in the adult female and adult male is as 10 to 6; its rate of mortality in them as 13 to 40. The most diseased age is from 30 to 40, and most mortal age from 50 to 60.

Peritonitis is three times more incident to the adult than the young: far more mortal, but far less prevalent, in the male than in the female. The most diseased age is from 20 to 30: the most mortal from 30 to 40.

Paralysis, *Mania*, and *Melancholia*, chiefly belong to adult age; are more mortal in the male; and the most diseased age is from 40 to 50.

Phthisis seldom occurs below puberty, being here sixteen times more frequent in the adult. The high irritability of the lungs in children does not admit of the tardy process of ulceration before the fatal issue. Effusion or gangrene destroy in the acute state of pulmonary diseases. The most diseased and mortal age is from 30 to 40. Yet Cullen places it earlier. It is very prevalent from 20 to 40.

Phrenitis seems to be nearly three times more prevalent in the young than in the adult. It is more mortal in the young female, but less prevalent. It is more mortal also in the adult female, from the facility of effusion or extravasation in her system, the proportion being 7 to 5. The most diseased and mortal age is from 2 to 5. The most diseased age in adults is from 30 to 40.

Pertussis. Only 1 of 31 cases occurred beyond the age of puberty. It is rather more frequent in the female, but more mortal in the male. The most diseased and mortal age is from 2 to 5.

Rheumatism chiefly belongs to adults. The most diseased age is from 30 to 40.

Scarlet Fever occurs much oftener beyond the age of puberty than measles or hooping-cough. The most diseased age is from 5 to 10.

Variola. Only six of the cases occur after puberty. It is both more frequent and more mortal in the male than in the female. The most diseased and mortal age is from 2 to 5.

The diseases which appear from this table to be chiefly prevalent in the young of both sexes, are convulsions, catarrh, enteritis, cholera with diarrhœa, fever (?), measles, phrenitis hydrocephalica, pertussis, scarlatina, variola; that is, the diseases of the brain, skin, and mucous membranes. These are ascertained by adding *one-third* of the combined amount of young and adult under particular diseases to the section of young, being the difference in the aggregate of these classes. The diseases of greatest *absolute* mortality in the young are convulsio, catarrh, enteritis, as 16 to 7. Cholera and diarrhœa as 15 to 10; gastritis 4 to 3; measles and pneumonia as 38 to 20;

phrenitis as 16 to 8; pertussis, scarlatina, variola.

In comparing the numbers in the above sections of the young and adult, a sixth of the combined amount of mortality under particular diseases is to be added to the column of deaths in the young, being the difference in the aggregate of mortality in these classes.

The diseases of highest *relative* mortality in the young are anasarca as 7 to 3, carditis as 8 to 4, enteritis as 8 to 5.7, gastritis as 39 to 17, hydrothorax and pneumonia 21 to 6, phrenitis as 5.7 to 4.7."

Art. II.—*On the Pathology of the Humors of the Eye. No. II.* By ALEXANDER WATSON, Esq. Fellow of the Royal College of Surgeons, &c.

Mr. Watson alludes to some former observations in which he described cases where the chrystalline lens had become detached from its capsule, and passed into the anterior chamber. Under such circumstances he thinks the best mode of proceeding is that recommended by M. Dupuytren, viz. to return the lens through the pupil, and then depress it in the vitreous humor. On the present occasion he proceeds to touch on some other points, beginning with ulceration of the cornea.

When such an ulcer penetrates into the anterior chamber of the eye, it is to be looked upon as an unfortunate occurrence. The first circumstance which takes place is the escape of the aqueous humour. If the opening be very minute, the aqueous humour oozes out gradually, and its escape is known by the eyeball becoming soft and flaccid, by the loss of vision, and by the approximation of the iris and lens to the cornea. If the patient keeps the eye in a state of rest, the whole of the aqueous humour may not escape; and for this reason less escapes through the night than during the day. As the aqueous humour is quickly regenerated, the eye in the morning seems to have recovered its natural state; but in the course of the day, the aqueous humour is again, in part or wholly, evacuated.

When this accident occurs, vision is much impaired, and the sight becomes confused. If so much of the aqueous humour is evacuated that the iris and lens come in contact with the cornea, general inflammation of the eye

is induced. By soothing and antiphlogistic means, together with absolute rest, the ulceration of the cornea, in the more favourable cases, has healed. In such cases the opening is closed by a thin cuticle, and sometimes, after this has occurred, the aqueous humour presses forward, and causes it to project from the cicatrix in the form of a small vesicle. This vesicle has been supposed by some of our most distinguished ophthalmic surgeons to be formed by the membrane of the aqueous humour; while others have attributed it to a protrusion of the vitreous humour. It may continue nearly stationary for months; or it may burst and disappear by the opening in the cornea closing; or it may form a small fistulous opening, through which some of the aqueous humour from time to time escapes.

When the opening through the cornea is large, the iris is not only pressed forwards, but a portion of it sometimes protrudes externally. The protruding portion adheres to the ulcer of the cornea, and generally causes a fixed and often contracted state of the pupil. The protrusion of a portion of the iris, in cases of penetrating ulcer of the cornea, before any of the other humours escape, Mr. Watson thinks rather a fortunate occurrence, as, by adhering to the cornea, the reparation of the breach in that part is effected, and, when the protruded portion has adhered, the eye gradually recovers by proper treatment. In consequence of the adhesion of the iris to the cornea, the pupil is generally contracted and immoveable. By this change, the eye loses its power of adaptation to different distances, but in the course of time the adherent portion of the iris, if small, elongates, and the motions of the pupil gradually return. The author of the paper draws the following inferences with regard to the treatment:—

“1. Caustic ought to be very cautiously applied in ulcers of the cornea: for if, by its incautious application, repeated sloughs are formed, an opening will be made through the whole thickness of the cornea, and the eye will be exposed to the destructive changes of structure above described.

2. When a protrusion of the iris takes place from sloughing or ulceration of the cornea, no attempt should be made to replace it into its natural position. It is rather to be considered a fortunate

event, as the only way by which the further destruction of the eye may be prevented.

3. This natural process by which a breach in the cornea is repaired may, in some cases where the evacuation of the eye is threatened, be advantageously imitated by art. This might be accomplished by making pressure upon the eyeball, or a small hook might be introduced through the opening in the cornea, with which a portion of the iris might be drawn out and strangulated so as to adhere. In performing this operation, care should be taken to draw out the ciliary rather than the pupillary part of the iris, in order that the size of the pupil may be diminished as little as possible."

Art. III.—*Case of Recto-Vaginal Opening, following lacerated Perineum, successfully treated by Operation.* By JOHN INGLIS NICOL, M.D. one of the Surgeons to the Northern Infirmary in Inverness, &c. &c.

Dr. Nicol gives a very candid account of the difficulties he experienced in attempting to bring the edges of the opening in question into contact, and retain them in that position. The first operation failed from the callous sides being imperfectly cut, and not thoroughly in apposition: the next time he had the advantage of better instruments, and succeeded. He remarks that, to insure success, "a considerable portion of the surrounding surface must be removed, and the parts thus bared must, as it were, be folded together."

Art. IV.—*Researches on the Force of the Aortal or Left side of the Heart.* By J. L. M. POISEUILLE, M.D. lately Pupil of the *Ecole Polytechnique* of Paris.

This paper is translated and abridged from the "*Répertoire Général d'Anatomie.*" It is an elaborate production, abounding in figures, and leading to no practical result. It will be remembered that Keil estimated the force of the heart at 5 oz., Hales at 5½ lbs., and Borelli at 180 lbs.—So much for the value of such calculations!!

Art. V.—*A Case of Perforation of the Stomach and Œsophagus, with brief Remarks.* By MARSHALL HALL, M.D. F.R.S.E. &c. &c.

A little girl was affected with hoop-

ing-cough early last April, having almost from her birth been subject to bronchitis. The symptoms now required the abstraction of blood by leeches. This was followed by exhaustion and subsequent re-action. There were convulsions, and a cold lotion was applied to the head, the warm bath being also frequently used. Mild mercurials and light diet were given. There was neither sickness nor diarrhœa. At the end of eight days, during which its state had varied, the child died.

On the fifth day after death the body was examined. In the right cavity of the thorax some venous blood was perceived, and a small part of the pleura in the vicinity was completely eroded; the subjacent veins had thus been opened while the nerves were left entire. Further examination led to the discovery of an opening in the œsophagus. On raising the stomach part of its contents escaped through this aperture, and part flowed into the abdomen through a large hole at its most dependent part. The mucous membrane, both of œsophagus and stomach, was reduced to a gelatinous mass; the other viscera were healthy. Dr. M. Hall is of opinion that these apertures resulted from the action of the gastric juice after death, and we have no doubt that he is right. Our readers will find some interesting observations on this subject in the *Edinburgh Medical and Surgical Journal*, Vol. VI., and in a thesis by Dr. Camerer, a pupil of Professor Autenreith. According to these various authorities, the extent of erosion depends in a great measure, as Dr. M. Hall conjectures, upon the period which intervenes between the death of the patient and the examination of the body.

Art. VI.—*Description of Apparatus and Experiments for determining the Composition of the Blood in Health and Disease.* By W. REID CLANNY, M.D. Sunderland.

Dr. Clanny, after referring to his interesting lecture on Typhus Fever, published last year, proceeds to detail the method adopted by him in his examination of the blood. Of this the following extract will convey a distinct idea:—

"I ordered a twenty-ounce graduated air-tight flask to be made, to which a stop cock was screwed, and having attached the flask to the aperture in the plate of the air-pump, by means of a

brass tube, I exhausted the atmospheric air from the flask by the air-pump. Having removed the exhausted flask from the air-pump, I attached to it above the stop-cock a tube about the diameter of a swan's quill, bent at a very obtuse angle, and having a ball blown upon the angle.

When the blood flowed from the vein, I held the glass tube as near as I could to the bleeding vein, but not touching it, and kept the flask in a suitable position till the glass bulb was filled. I now opened the stop-cock, and the blood rushed into the empty flask from the glass bulb. In this way I so managed the stop-cock, that, as the blood continued to flow into the glass bulb, it was permitted to rush into the exhausted flask, till I had taken a suitable quantity of blood *in vacuo*.

After some practice, I was enabled to manage the stop-cock, so that I could take whatever quantity of blood I required with the greatest facility.

The next step was to shut the stop-cock, and remove the glass bulb from the flask, and attach to it a well-constructed apparatus for drawing whatever gas might be contained in the blood through a graduated flask of lime-water, placed in the exhausted receiver of the air-pump. In this manner the carbonic acid of the blood coming into union with the lime of the lime-water, and forming carbonate of lime, the quantity of carbonic acid in the blood was very readily and very accurately ascertained. I was particularly cautious, by a proper arrangement of valves, that no lime-water found its way into the flask containing the blood, which otherwise will always be the case when the atmospheric air is permitted (after this part of the experiment is finished) to pass into the receiver of the air-pump.

It is necessary to mention that the flask, previous to its being used, was weighed; and after the carbonic acid was removed from the blood by the above-mentioned apparatus, the flask, with its contents, was again weighed.

The next process was to set the flask containing the blood upon its side, and after it had stood in that position for two or three hours, I poured off the whole of the serum in the most careful manner. The serum was coagulated at a well-regulated temperature, and being cut into small pieces, was placed upon a perforated Wedgewood funnel, and

the serosity drained off; besides which, the coagulated albumen was washed most carefully with warm water, and the washings added to the serosity.

The coagulated albumen was weighed. The serosity and the washings of the coagulated albumen were placed in a Wedgewood capsule, and evaporated, and the salts which were left were collected and weighed. The crassamentum from which the serum was poured, was weighed; and the fibrin separated from the colouring matter was collected in a fine linen bag, through which a current of distilled water was passed. The fibrin was pressed for some time in a press of my own construction; and when the water was pressed out, and the moisture removed from its surface, it was weighed.

The solution of the colouring matter which passed through the linen bag was evaporated, and the colouring matter weighed.

I adopted the plan of receiving blood *in vacuo*, in order that the oxygen of the atmosphere might have no chance of uniting with the carbon of the blood in its transit from the vein into such vessels as are usually had recourse to for receiving blood; and by way of putting this plan to the proof, I constructed a graduated jar sufficiently large to hold a suitable portion of warm distilled water, into which the hand of a man with an opened vein could be most conveniently held till fifteen or twenty ounces of blood were taken. To this jar a well-ground plate and stop-cock were attached after the blood was taken, the space which was left by removing the hand being supplied by hollow metal balls. The blood always keeps to the bottom of the water, and not one particle comes up to the surface.

This jar, containing the blood and warm water, was attached to the apparatus above-mentioned, and placed in the exhausted receiver of the air-pump. I found the same results in both cases.

When I expected to meet a difficulty in procuring blood, I requested the surgeon to secure the arm or wrist in the usual manner, and place himself by the shoulder of the patient; and instead of carrying the lancet into the vein, so as to form an acute angle with the current of the blood, he was desired to penetrate the vein with the point of the lancet towards the hand, as by this plan the blood flows at an obtuse, not an acute

angle, to its current towards the heart. This plan suggested itself to me in cases when the veins were peculiarly small, deep-seated, or embedded in fat, and I have reason to be perfectly satisfied, from ample experience, that this is the best plan, even in ordinary cases.

I have always found the greatest difficulty in heating fibrin of the blood, so as to obtain uniform results; for fibrin may be gradually heated till it lose one-half of its weight, though its general appearance and qualities remain the same. On this account I constructed my fibrin press, which I consider indispensable for comparative trials in cases of sound or unsound blood. I may remark in passing, that I could perceive no difference in the time required for coagulation of blood, whether it was taken in the usual manner, in vacuo, or in water. At the same time, I acknowledge that my attention was only slightly directed to this phenomenon; nor did I ever make any direct experiments, so as to be able to form a correct opinion upon this question."

[To be continued.]

EXTRACTS FROM JOURNALS,

Foreign and Domestic.

BILIARY CALCULI EVACUATED FROM AN ABSCESS IN THE REGION OF THE LIVER.

M. BAFFOS relates the case of a female, aged 81, the mother of twelve children, who first experienced acute pains in the stomach and right hypochondrium after the scarcity of the year 1816. These pains were increased by the use of spirituous liquors; digestion became more difficult, the alvine evacuations less regular, with frequent vomitings, and an almost constant sleeplessness. A swelling in the region of the liver took place, and acquired such a size, that the patient was compelled to remain in bed, in a half-bent posture; or sitting, with the heels brought up to the pelvis. After poulticing the tumor in the side for some time, it gave way, and evacuated pus of different colours, and a stone, which, according to the patient's description, was about the size of a hen's egg. This calculus was not preserved. The wound remained fistulous until 1821;

it discharged a greenish-coloured fluid; at that period it healed up, and the vomitings re-appeared immediately. A fresh tumor formed above the cicatrix: emollient applications favoured the opening of this abscess, from which, together with the pus, another calculus escaped, of the size and shape of a walnut, flattened at each extremity. After the opening of this second abscess, the wound continued open, when M. Grand-Claude saw the patient for the first time, on the 29th Nov. 1827, and recognized the fluid that issued from it to be bile: fresh symptoms of disturbance supervening, a probe was passed into the fistulous opening, and a third calculus detected, the exit of which was facilitated by dilating the orifice with sponge tent. This calculus, which was extracted without difficulty by the aid of a pair of forceps, was of a cubic form, greyish in colour, and weighed 34 grains. The patient's condition remains the same as before the extraction of this calculus.—*Bulletin des Sciences Medicales.*

CASE OF TETANUS CURED BY BLEEDING.

A man, of about 30 years of age, after working very hard, experienced severe pains in the vertebral column: he was attacked by locked jaw, to which, in a few days, succeeded tetanus and emprosthotonos. In the course of nineteen days he was bled eight times from the arm: the four first bleedings were performed in the first two days, from three to four pallets each. In the same time, *six hundred and eighty* leeches were applied along the spine, two or three warm baths were administered, and every morning and evening a simple clyster, with an addition of 25 drops of laudanum, which were gradually increased to 105 drops. The patient was cured. It is to be remarked, that notwithstanding the great loss of blood, the pulse continued both very full and very frequent. The man was so little weakened, that on the fourth day of his convalescence he was in a condition to walk.—*Revue Medicale.*

INTERMITTENT TETANUS.

A woman, 67 years of age, was affected with whitlow on the thumb of the right hand: the first phalanx being detached, the wound healed; a fortnight afterwards a pricking pain was felt in

the lower part of the cicatrix, which extended little by little to the whole arm, following the course of the median nerve: this pain lasted from five minutes to a quarter of an hour, and returned once every day. After the lapse of a few months, trismus and opisthotonos were added to the other symptoms. The thumb was amputated, and the disease did not reappear. On examining the amputated part, it was observed that the cicatrix was cartilaginous, and that a nervous twig that was imbedded in it was of a deep red colour for the extent of a line and a half.—*Heidelberger Clinische Annalen*.

ANOMALOUS VERTEBRAL ARTERY.

M. A. Meckel, of Berne, on opening a dead body, observed a curious case of the above kind. There were three vessels on one side: the first, of middling size, arose from the posterior part of the subclavian, where it usually takes its origin; the second, larger in size, arose more deeply from the anterior portion of the same vessel; and the third, which was considerably smaller, was a branch of the inferior thyroid. These three vessels united above the transverse apophysis of the fifth cervical vertebra, and then formed one vessel, which pursued its usual course to the head.—*Archives Générales*.

ON TANNIN IN MENORRHAGIA.

The *Revue Médicale* of the month of September last contained some observations of Pata upon the good effects of tannin in the above disease. When these observations met the eye of M. Cavalier he was attending a young woman, 33 years of age, affected with hæmorrhage from the uterus, for the cure of which he had employed various means in vain. It must be observed, that this female had been subject, for many years, to a bleeding from the anus, which increased in winter and summer, but without deranging the course of the menstrual discharge. But after a violent affection of the mind, this bleeding became much worse, and a uterine hæmorrhage also took place. At length M. Cavalier prescribed the tannin, in doses of two grains every two hours. On the first day, some amendment was perceptible; on the second, the flux of blood from the anus

ceased; and on the third, the menorrhagia was stopped, giving place to an abundant leucorrhœa, but this also diminished under the continued use of the same remedy, and the patient became convalescent. The same author also relates the case of a young girl of 17, who was affected with uterine hæmorrhage in consequence of using violent exercise during the period of menstruation. She had employed all the common remedies, including extract of rhatany and opium. Every thing having been useless, he prescribed the tannin, and with success equally prompt as in the first instance; for, at the end of four days, the discharge had entirely ceased.—*Revue Med.*

DEATH FROM PHOSPHORUS.

A chemist at Biel, wishing to make experiments on the action of phosphorus, took a grain of that substance with sugar on the 20th of October last; next day he took two grains; and on the 22d three grains. Towards evening he experienced great uneasiness, particularly in the abdomen; but these symptoms he unaccountably attributed to rheumatism, and employed no remedies. On the 24th he was seized with constant vomiting, and the matters ejected had the odour of garlic. Medical assistance was now called on, but without avail: inflammation of the alimentary canal took place, on the 29th he had spasms, and the left arm became paralyzed; he was delirious, and soon after expired, having fallen a victim to his incautious experiments.

POISONED SUGAR PLUMS.

The French chemists have at different times pointed out the danger of eating coloured "bonbons." In a recent number of the *Clinique* it is stated that many accidents have very lately occurred in Paris from this cause. Query—How are the sugar plums coloured in London?

SULPHATE OF COPPER IN BREAD.

M. Orfila has detected sulphate of copper in bread made at Bruges. He was consulted by the authorities there on the subject, from a suspicion on their part that deleterious substances were employed by the bakers in that city to improve the appearance of the bread. Do the London bakers make us eat blue vitrol in our rolls?

SINGULAR CASE OF CATARACT.

A robust peasant, about 60 years of age, who had never experienced any ill-health, except slight attacks of gout, was occupied in cutting wood in a forest, when he was suddenly seized with a dimness of sight, which gradually increased till, at the expiration of a few hours, he was entirely blind, and obliged to be led home. He had no pain, and there was no inflammation visible. In a few days after he was seen by Dr. Wondelstrom, who found that both eyes were affected with cataract. The operation of extraction was performed. — *Arsberättelse om Svenska Lakare, &c.; a Swedish Journal.*

PROCEEDINGS OF SOCIETIES.

HUNTERIAN SOCIETY.

Last meeting of the season.

DR. BILLING, PRESIDENT, IN THE CHAIR.

MR. COOKE related a case in which the good effects of inhaling the nitrous oxyde gas had been very striking. A gentleman had for some time been labouring under symptoms which indicated incipient phthisis, viz. soreness of the chest, quick pulse, cough and purulent expectoration, hectic fever, and colliquative sweats. His physician believed that tubercles were forming. He inhaled the gas for a short time with immediate and decisive advantage in every point.

DR. BABINGTON adverted to the very extraordinary effects produced by this gas on some individuals; exciting, first, gratification, then ardour, next greediness of inhalation, and lastly violent action. In the case related by Mr. Cooke, he considered it doubtful whether tubercles had formed, or whether the disease were not one of the mucous membrane. In the experiments formerly made with oxygen gas, he conceived that there must have been many errors, owing to the combinations it would receive according to the nature of the article from which it was obtained.

DR. MACBRAIRE detailed a case of abscess of the lung in a child of 16 months. It had formed in the upper part of the viscus, going through successive stages of engorgement, hepatization, adhesion, and presentation outwardly. It terminated in death.

DR. BABINGTON communicated a case

of pulmonary abscess, from which the patient appeared to have nearly recovered. The patient was about fifty years of age, and of a slender habit. The expectoration was very copious and offensive. The symptoms became alternately mitigated and aggravated four or five times before convalescence was established. The individual had been abroad, but there were no signs of hepatic disease. He mentioned another instance of recovery under equally unpromising circumstances; the expectorated matter was bloody, and almost intolerably offensive. This patient, after going for a while into the country, went to the West Indian Islands, whence he returned in health.

DR. MACBRAIRE considered the cases related by Dr. Babington as highly important. The fetor of the pus from the lungs had been considered by pathologists as an indication of gangrene. He related an instance of that kind in which the patient died from hæmorrhage.

The PRESIDENT did not consider the excessive fetor of the matter, in the case related by Dr. Babington, as the usual character of abscess of the lung. He had observed extreme offensiveness in the sputum after hæmoptysis. He had attended two cases of abscess of the liver, but the matter was not very offensive in either.

MR. LAW had seen four cases of hepatic abscess, but the pus was not remarkably offensive.

MR. GREENWOOD adverted to an instance of abscess of the liver bursting into the lung. The matter expectorated was not fetid.

DR. BABINGTON said that pus from the liver, according to his experience, was usually extremely offensive.

DR. MACBRAIRE adverted to the experiments by which some French pathologists have endeavoured to prove that the colour of the sputum, whether yellow, green, grey, or like rust of iron, depended upon the quantity of blood mixed with the mucus.

MR. ROBERTS suggested that imitations out of the body scarcely allowed of a parallel with mixture effected within it. He reminded the meeting that in the secretion from the urethra and conjunctiva there were similar shades of colour.

The hour for adjournment having arrived, the President announced that this was the last meeting for the season,

and congratulated the members on the great practical interest which the meetings had sustained. He then intimated that the Society would not meet again until October.

HOSPITAL REPORTS.

HOTEL DIEU.

Case of Aneurism in which the Artery was tied on the distal side.

WE regret to say that the patient on whom M. Dupuytren tied the subclavian artery on the distal side of an aneurism, reported in our number of June 27th, died on the twelfth day after the operation.—As the details which we have received are not sufficiently full, we shall delay our account till a future opportunity.

LA CHARITE.

Case of diseased Urethra, with Retention of Urine—Extraordinary measures adopted by M. Roux.

ON 22d April an old man was admitted under the care of M. Roux. The case of this patient, already sufficiently severe, presented a character still more serious and important in consequence of the extraordinary measures resorted to by the surgeon for its relief. M. Roux, on questioning the man, discovered that he had only once had a gonorrhœa in his youth, but that the water had been passed with difficulty for some time; that he had neglected what he considered only as an inconvenience, but that, within the few last days, there had been a complete retention. Not only did the urethra appear much contracted, but it was evident that the canal had undergone a rupture (neither the seat nor extent of which could be determined), since there was a urinous abscess developed in the perineum. The first indication, of course, was to pass the catheter, and to draw off the urine contained in the bladder; but after many attempts, with various instruments, this was found to be impossible, and, considering M. Roux's dexterity, he had great right to presume that any other person would equally have failed. However, in examining the patient carefully, the tumor observed in the hypogastric region was thought not to belong entirely to the mere distention of the bladder; it was not globular,

smooth, and resisting; on the contrary it was very irregular; it extended upwards towards the right flank; it was besides soft, and a certain fluctuation was perceptible. In consequence of this, M. Roux, although he had discovered the existence of stricture in the urethra, and consequently of a considerable increase in the size of the bladder, fancied that this tumor was a purulent collection, first originating in the cellular tissue of the perineum, but communicating with that of the pelvis, and extending to the right flank. One other circumstance seemed to strengthen this opinion, which was, that whilst attempts were made to pass the catheter, a bloody pus escaped by the upper end of the instrument, and on pressing the perineum a still larger quantity escaped. There was nothing to exclude the idea of a communication between the two tumors. M. Roux, agitated by these suppositions, was uncertain as to what line of conduct he should adopt; certainly the most obvious and simplest plan was to penetrate into the bladder by the natural passage, but unluckily he had been unable to accomplish this, notwithstanding all his address. It appeared certain that the extremity of the catheter penetrated into the perineal abscess; the continual escape of the pus proved this. Obligated to abandon all his efforts in that direction, and leaning to the opinion that the hypogastric tumor was an abundant collection of pus, he decided upon making an opening into the abdomen. He afterwards said, that had he been well convinced that this tumor was merely the bladder in a state of distention, he should have been content with simply puncturing it; but he feared (should that not be the case) to wound the bladder unnecessarily. He therefore wished not to open the bladder, and yet he made an incision two or three inches long, in the parietes of the abdomen, parallel to the linea alba, and immediately above the pubes. He divided the parts layer by layer, so as only to involve the abdominal parietes; but such was the size of the bladder, and its adhesion to those parietes (as he said) that his instrument passed at once into its cavity: immediately an abundant discharge of fluid ensued, which was recognized as urine tinged with blood; there was, therefore, on this side, only the common result of a complete retention of urine; however, the

opening was enlarged, so as to permit a gum elastic catheter, of a very large size, to be introduced and left in the bladder. Some trials of rather a singular nature were then made: not only was an instrument again introduced into the urethra in the ordinary manner, but, as the finger of the operator, inserted through the wound he had made, was able to reach the neck of the bladder, it struck him to pass a catheter in this direction also: it was guided by the finger into the neck of the bladder, and having passed a certain space, probably the prostatic portion, it also was stopped by the stricture. The operator, therefore, held two catheters at the same time; one reaching from the orifice of the penis to the stricture, the other from the wound in the abdomen, through the neck of the bladder, to the same spot; and thus he could appreciate in some degree, he said, the space contained between the two extremities of the instruments. Such was the first result of this severe and long operation. The patient was then permitted to rest until the next day, the 23d.

On that day, M. Boyer examined the patient, and he thought it necessary, as well as M. Roux, with the double intention of opening the perineal abscess and giving a more favourable issue to the urine, to make a large incision of the integuments parallel to the raphe, below the testicles, and thus to open the urethra. This incision was therefore made by M. Roux, who, after having passed a catheter by the wound in the abdomen, thought he felt the point sufficiently to enable him to make it a guide for the rest of the operation; that is, for the incision into the urethra. This was a conductor rather of a novel species: a very large-sized gum elastic catheter was finally pushed, by this new passage, into the bladder; and as that was considered sufficient, the other was withdrawn.

About an hour and a half after the operation, a pretty considerable hæmorrhage took place from the wound in the perineum. M. Boyer was still in the amphitheatre, and he discovered that the bleeding proceeded from a small arterial branch of the internal pudic: it was readily seized by the forceps, and secured. From that time the urine chiefly flowed through the catheter, and very little was observed at the upper

orifice; nevertheless, considering the man's age, the loss of blood, and the severity of the operations he had undergone, there was nothing encouraging in his condition. On the 24th, at five o'clock in the evening, the patient died, his state of tranquillity being only disturbed, two hours previous to his death, by delirium.

Necropsy.—The body externally was remarkably thin, and the abdomen greatly tumefied, from which, when opened, a great quantity of fœtid gas escaped. The anterior parietes, divided transversely above the navel, was turned down towards the pubes. The peritoneum presented scarcely any trace of inflammation, with very little serum, or redness, and no false membrane. The anterior parietes of the bladder adhered to the abdomen above its ordinary connexion, and the incision had penetrated at once into that viscus. M. Boyer himself having sawn through the pubes, removed all the parts, including the rectum: he afterwards prolonged the incision made during life to the anterior part of the bladder, and a little pus was observed disseminated between the peritoneal and muscular coats: this latter was greatly thickened, so as to be five or six lines thick. In the interior it presented thick fleshy columns, resembling those of the heart; between these columns were large cells, especially towards the bottom of the bladder. All the neighbourhood of the wound in the abdomen was filled with coagulated blood. M. Boyer, with the help of a grooved sound, divided the upper part of the urethra from behind forwards, and the following particulars were observed:—The prostatic portion was sound, the prostate itself only presenting those small connexions found generally in old men; but the bulb of the urethra was the seat of the disease. An irregular opening was situated on the right side, communicating with the abscess of the perineum. The incision made by M. Roux was before the stricture, or rather the closing of the urethra, which extended for about an inch. The rest of the canal was sound. The abscess occupied but a short space, and the cellular membrane in its vicinity was indurated.—*La Clinique*, 28 Avril.

[Some very severe remarks have been made on the above case in some of the French periodicals: we leave our readers to judge for themselves.]

HOSPITAL DES ENFANS.

Disease of the Brain.—Destruction of a Portion of the Stomach, and Perforation of the Diaphragm.

A CHILD, six years of age, was admitted, under the care of M. Guersent, with well-marked cerebral symptoms, for which leeches were applied to the head, blisters to the neck, and mustard poultices to the feet, while calomel, &c. were administered internally. During the whole progress of the illness, the child complained of the head, and nothing but the head, and in about a week he died. On opening the body effusion was found in the brain, and a small tumor on the lower surface of the tentorium cerebelli; but what is most worthy of notice presented itself in the thorax and abdomen. The lung of the left side was slightly adherent anteriorly to the ribs, but behind was free, and bathed in a brown coloured fluid. On examining, to ascertain where this had come from, it was found that the diaphragm and stomach were perforated. The parts were then removed. The œsophagus had at its lower portion a layer of what appeared to be false membrane, but beneath which the mucous membrane was perfectly sound. In the stomach, extending from the cardiac towards the great curvature, was a large opening presenting against the inferior surface of the diaphragm. The mucous membrane of the stomach was of a yellowish colour, and ceased suddenly an inch from the aperture; from this point, to the edge of the opening, the remaining parietes of the stomach became gradually thinner, till they reached the border of the aperture, which was very irregular. There was no adhesion between the stomach and diaphragm, which, for two inches corresponding to the opening, was deprived of its serous covering, while in some parts the muscular fibres were perforated, and the ragged edges floated in the fluids of the stomach. The body was examined 29 hours after death, and none of the parts had any offensive smell.

The reporter of this case (in the *Clinique*) enters into a long discussion to determine whether this state of the stomach caused the affection of the head, or *vice versâ*. It is quite obvious that it was a post mortem effect; and is very similar to the case detailed at page 183 of the present number, as having occurred in the practice of Dr. M. Hall.

HOSPITAL OF ST. JOSEPH, LISBON.

Our readers will, we think, peruse with some interest the following cases, which illustrate the state of surgery in Portugal.

CASE I.—Ligature of the External Iliac.

J. Martin, aged 39, of strong constitution, addicted to the use of spirituous liquors, was admitted into the above hospital, Nov. 16, under the care of M. Joseph Lorenzo de Cruz, having an aneurism in the groin as large as a hen's egg. He attributed the disease to an exertion he had made in lifting a heavy box. It had begun about four months before, and had observed a slow but progressive increase.

Dec. 8.—It was determined in consultation to tie the vessel next day: meantime a purgative was administered.

9th.—The patient being placed on his back, the legs slightly bent on the thighs, the thorax upon the abdomen, the operator, standing on the right side of the patient, made an incision which extended from the anterior superior spine of the ilium as far as the upper and outer part of the lower orifice of the inguinal canal. The first incision divided the integuments, and the next the internal oblique, through the whole extent of the wound. The operator then introduced the fore-finger of the left hand beneath the edge of the external oblique and transversalis muscles, between them and the peritoneum. A short curved probe-pointed bistoury was then insinuated, and the muscles divided. After this the surgeon carried the same finger behind the peritoneum, as far as the inner part of the psoas muscle, in order to find the external iliac artery and vein. Some lymphatic glands presented some obstacle to the finger passing between the vessels, but this object having been accomplished the finger was kept in that position so that the vein lay at the back of it. The operator next took a curved needle, and passed it under the artery until it came to his finger, on the concavity of which he directed it till the point made its appearance externally. A gut-thread (cord a bogau) of middle size was introduced through the eye of the needle, which being withdrawn carried the ligature with it. The artery was raised by means of the thread to ascertain that no other parts were included in it; two knots were then tied, and the

thread cut close. The wound was closed, and the limb, in a half bent position, placed in dry flannel.

Very minute and almost daily reports are continued for above two months; suffice it to say that, by means of one or two bleedings, and open bowels, in the first instance, and poulticing, with light nourishing diet, afterwards, a copious suppuration of the tumor was safely passed through; and on the 85th day the patient was discharged well, with the wound entirely healed.—*Journal Hebdomadaire*.

CASE II.—*Ligature of the Common Carotid for hemorrhage from a wound in the artery passing through the Parotid Gland.*

E. Duarte, æt. 44, of middle stature and sanguine temperament, addicted to spirits, was admitted into the Hospital St. Joseph at 7 o'clock in the evening, Feb. 27, 1825, having a wound about fourteen or fifteen lines in extent, made with a cutting instrument, on the left side of the face on the parotid gland. On introducing the finger it was ascertained that the wound took the direction of the pharynx. The patient stated that he had received the injury at half-past six, and lost a large quantity of blood at the moment from the external opening, and a little from the mouth. The slightest movement of the jaw brought on copious bleeding; the face was pale, the pulse scarcely to be felt, and the limbs cold.

As it would have been difficult to secure the vessel at the site of the wound, it was deemed more expedient to take up the common carotid, and this was immediately done by M. J. Lorenzo de Cruz, in the manner recommended by Mr. Hodgson. He went on without any thing very remarkable till the thirty-seventh day, when he was seized with violent hemorrhage from the lower orifice; the blood, from its quantity, colour, and the rapidity with which it flowed, had every appearance of being arterial: he fainted, and remained long in that state. Compression was employed, and when he recovered from the syncope he was bled to the extent of five ounces. He was placed on rigorous diet and absolute rest. The bleeding did not return, and on the 66th day he was discharged, the wound having entirely healed.—*Ibid*.

MEATH HOSPITAL, DUBLIN.

Ligature of the Subclavian Artery.

On Tuesday, 30th June, the operation of tying the subclavian artery was performed in this hospital by Mr. Porter, under the following circumstances:—

The patient, an apparently strong and otherwise healthy man, aged about 39 years, and by occupation an ostler or helper in a stable, applied to Mr. Porter on the 25th instant, complaining of pain and numbness of the left arm, inability to move the fingers, with occasional starting through the limb. On examination, a pulsating tumor about the size of an egg was discovered below the clavicle, corresponding to the line of division between the deltoid and pectoral muscles. He was not aware of having received any injury in the part; had never felt any thing giving way within, nor did he attribute his sufferings to the presence of the tumor. On compressing the artery above the clavicle against the first rib, the pulsation in the tumor ceased, and it became flaccid. He was immediately admitted into the hospital.

From the time of his admission the tumor increased in size with great rapidity, extending outwards in the direction of the axilla, leaving the clavicle and all the parts above it undisturbed in their relative situations. It appeared, therefore, to be a favourable case for operation, and as, from the quickness of its growth, there seemed to be every reason for avoiding delay, Mr. Porter determined on tying the vessel above the clavicle, just as it has passed through the scaleni muscles. The operation was performed in the following manner, in the presence of the other surgeons of the hospital, and Messrs. Wilmot, Colles, &c.

The patient being placed on a table, his head supported, his arm placed close to his side, and the light allowed to fall on the side of the neck, an incision about $2\frac{1}{2}$ inches in length was made along the clavicle from without inwards, terminating about the centre of the scalenus muscle. From the inner termination of this, another incision was carried upwards in the course of the fibres of the muscle. The flap was then dissected back, and the fascia of the neck and a number of veins exposed, amongst others a very large trunk of the external jugular. This fascia was then divided, avoiding the veins as much as possible, but a small branch was cut across, close to the above-mentioned trunk, which, pouring out a quantity of blood, was secured by a temporary ligature. With the handle of the knife, the cellular substance was detached and pushed outwards, and a very large artery and vein (the transversalis humeri) were found traversing the centre of the perpendicular wound in such manner that, had the edge of the knife been used, they must have been divided: these were pushed upwards in the wound, and held so by a bent probe. After a little further dis-

section in the same manner, the external edge of the scalenus came into view, with the large trunks of the nerves passing through it, and one of the deepest of these receiving a pulsatory impulse from the artery below it, was for a moment mistaken for the vessel. The error, however, was very soon corrected, and by a little more dissection, still with the handle of the knife, the vessel was laid bare, and the needle passed round it from above: it was then tied; the pulsation in the aneurismal tumor and in the artery at the wrist ceased immediately, and the lips of the wound being brought together with strips of adhesive plaster, the patient walked from the operating theatre to his bed.

The operation was performed in 34 minutes, but it was quite evident that time was sacrificed in order to save the loss of blood. Had the operator afforded himself more room by cutting outwards, and dividing the great trunk of the jugular vein already mentioned, he must have reached the artery in a shorter space of time. But, notwithstanding the suggestions of many around him, he still persevered in sparing this vessel, which must of necessity have been subsequently secured by ligature. The total quantity of blood lost during the operation could not have exceeded ten or twelve ounces.

We shall report the progress of the case.

GLASGOW ROYAL INFIRMARY.

Spontaneous Gangrene—Amputation.

JAMES URE, a servant in a distillery, a stout, but strumous-looking young man, of 23 years of age, was brought to the infirmary with his left leg in a state of complete mortification: the line of separation was distinctly marked about two inches below the knee, and at the posterior part of the leg both bones were exposed to a considerable extent; the integuments were undermined, so that the probe passed upwards nearly to the joint; from this sinus there was profuse thick foetid discharge. He perspires a good deal at night, and his sleep is disturbed, with occasionally slight delirium; appetite excellent; bowels slow; pulse 100, of moderate strength. He had travelled on the day of admission 19 miles in a cart, and did not seem much fatigued.

The substance of the following account was given by the gentleman who had attended him in the country:—

The patient was seized with typhus fever, the symptoms of which were moderate, but attended by considerable delirium; on the seventh day he had a distinct crisis, and seemed to be rapidly recovering, when, on the ninth day, he was affected with coldness of both legs, with sharp prickling pains: these affections left the right leg in a few hours, but continued in the left. Warm fomentations were applied, and ammoniated oil rubbed in, with temporary relief. Next

day the pain was diminished, but the leg and foot appeared swollen, and of an obscure red colour; the heat and sensation were diminished; three of the toes were of an ash colour, and had a shrivelled appearance. The pulse rose in the afternoon from the natural standard to 120, very weak; low delirium and prostration of strength; he twice vomited a quantity of bilious matter. A lotion of strong spirits was ordered for the limb. He had a purging dose of calomel, which produced two foetid stools. Was permitted to take whiskey, to which, when in health, he had been accustomed, and appeared revived by it.

Third day from gangrenous affection.—Appearance of limb much the same, except a dark livid patch on outside of calf; crepitus felt on pressure.

To have ℥ss. of Cinchona, in form of infusion, daily. Acid Sulph. Dilut. gtt. xxx. four times a day; and Tinct. Opii gtt. xxx. morning and evening. To have generous diet, and spirits to the extent of seven wine-glassfuls daily.

Little change took place till the seventh day, when a line of demarcation began to form below the knee. The limb was covered with effervescing poultice. From this time his health began to improve, and his appetite became good; his bowels were slow, and he required the use of enemata. In a week or fourteen days from the attack, the separation between the dead and living parts was complete; but it being inconvenient to have an operation performed in the place where he lived, another week elapsed, when he was brought to the hospital.

The day after his admission, Dr. John Couper amputated the limb above the knee, by the double flap operation. He bore the operation well. He had a little wine from the first, and in a few days, instead of the spirits he had formerly had, ℥vi. of wine and ℥iij. of whiskey were ordered. His beef diet was also, much to his satisfaction, restored him. In coming into town in the cart, the cuticle over the sacrum was slightly abraded; and although this was attended to from the first, a small slough could not be prevented from forming. With this exception, he went on favourably, and was sent home to the country nearly quite well a few days ago.—June 10, 1829.

NOTICES.

Dr. Baron's paper was not received until the first sheet, in which original communications are inserted, had been made up. We shall give it next week.

ERRATUM.

In our last leading article, p. 150, first column, for "somewhat inclusive," read "somewhat inconclusive."

THE LONDON MEDICAL GAZETTE,

BEING A
WEEKLY JOURNAL

OF
Medicine and the Collateral Sciences.

SATURDAY, JULY 18, 1829.

ABSTRACT OF A CLINICAL LECTURE
ON
STRANGULATED INGUINAL
HERNIA,

Delivered at Guy's Hospital, July 1,

By C. A. KEY, Esq.

G. BESSEL, æt. 32, a stout and rather fat man, admitted into Guy's Hospital June 28, labouring under strangulated inguinal hernia. He had been subject to hernia for five years, but only remembers it having descended five or six times, and then he could always return it without difficulty. On the day preceding his admission, it suddenly came down, while he was walking in the street, and, from the pain and sickness it produced, he was obliged to be carried home. A surgeon was sent for, who bled him largely, and tried the taxis for two hours, but without making any impression upon the tumor.

The hernia is large, extending to the bottom of the scrotum, but not very painful when handled. He has vomited occasionally, and his countenance shows much anxiety; he complains of much pain in the abdomen, which is tense, and he is slightly troubled with hiccup.

In consequence of the previous long trial of the taxis, Mr. K. determined to await the effects of the tobacco before attempting to return the gut: he ordered half-a-pint of the infusion to be injected, and gave the man a small piece to chew. In a quarter of an hour the remedy began to take effect, and though pressure was kept up steadily for nearly a quarter of an hour, not the least impression was made upon the swelling. The operation was therefore proposed, and assented to by the patient. Mr. K., before per-

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forming the operation, signified his intention of endeavouring to divide the stricture without opening the sac; he therefore began the incision in the integuments somewhat higher than usual, carrying it down for the space of two inches, and laid bare the external abdominal ring and the fascia of the cord, which gave a covering to the hernia: a director being carried under the external ring the tendon was divided upward, and the edges of the internal oblique and transversalis muscles, with the cremaster, exposed. The bistoury was then passed upon the director, under the cremaster, until it reached the constricting bond of the transversalis tendon; and with much caution this latter, which appeared to cause the stricture, was divided to a certain extent. Mr. K. then made an attempt to reduce the contents of the sac by pressure, but could not succeed, and, conceiving that the impediment to reduction arose from his not having sufficiently divided the stricture, he cautiously divided some fibres on the fore part of the neck of the sac, but in doing this made a small opening into it, from which a dark-coloured serum issued. The sac was therefore opened so as to expose its contents: the stricture was found to have been perfectly divided. The omentum, the whole of which was contained in the sac, was ecchymosed in several parts, from the effects of pressure, and a portion of the ileum, which was at the posterior part of the sac, was of a brick-dust red colour, but free from any marks of contusion. The patient expressed himself relieved after the operation. He was ordered small doses of magn. sulph. ex aq. menth. every three hours.

On the following morning, early, the

dresser was called up, in consequence of the patient becoming affected with pain in the abdomen. Leeches were applied, and an enema of *ol. ricini* exhibited. By 12 o'clock, no stool having been procured, and the pain continuing, he was ordered *calom. gr. ij. opii gr. j.* every four hours. In the evening his pain continued, pulse weaker, and no motion; he expressed a wish to take castor oil, which was complied with. In the afternoon he felt a sensation of something having descended into the sac. Mr. K. did not think, from examination, that any portion of gut had returned into the scrotum, but that a small quantity of fluid might have passed from the abdomen.

30th.—Had had a bad night; complained of sickness; no motion; *ol. ricini* injected into the rectum with some *infus. sennæ*: to continue the calomel and opium. By 12 o'clock he had a motion, and at 2 a second. These were followed by extreme depression, and coldness of the extremities, and his tongue became loaded with a double fur; he was ordered to have some wine, with brandy, as might be required. In the afternoon his sickness and pain had entirely abated; his features were sunken, his extremities cold, and a clamminess covered the whole surface. He lived till six o'clock in the afternoon, when he expired.

The appearances upon examination were those usually found in persons who die of peritoneal inflammation. The whole surface of the intestines exposed to view was highly vascular, and a few flakes of lymph were discernible; the principal part of the effusion, however, was mere fluid, and, as Dr. Hodgkin observed, not of the plastic kind. The portion of intestine which had been strangulated, was more inflamed than the other parts; it was a portion of ileum, about a foot distant from the colon. The omentum presented the same ecchymosed appearances observable during the operation; and afforded a probable solution of the inflammation which had been set up subsequently to the operation; indeed, Dr Addison, who was present during the inspection, thought that had the omentum not been returned, but removed by the knife, the patient would have had a better chance; as, being in a bruised condition, it acted as a foreign body in the abdominal cavity.

On the above case Mr. Key observed,

that more information might be obtained frequently from unsuccessful than from successful cases, and he should therefore explain the mode of operation he had adopted, and how far it is generally applicable in practice. Too much caution could not be used in the employment of the taxis, as, by bruising the intestine, or, as in this case, the omentum, the parts are rendered incapable of recovering their healthy condition. Inflicting an injury on a part already in a state of inflammation, cannot but be doubly injurious, by adding to the existing mischief, and rendering the gut unable to repair the injury it has sustained. From the length of time employed in the taxis before his admission into the hospital, Mr. K. determined to employ no pressure until he had obtained the full effect of tobacco, and, if that failed, to proceed at once to the operation. The effect of the tobacco was well marked; previously to its exhibition, the pulse was 84; in a few minutes it rose to 100; and in a quarter of an hour it had reached 143, while its strength and fullness had nearly in proportion diminished. Under this favourable state of exhaustion, pressure was steadily kept up, but without the least effect upon the hernia.

You must be well aware (continued Mr. Key) that the principal source of danger attending the operation, or rather as a consequence of it, is the opening the sac, and thereby laying bare the peritoneal cavity of the abdomen. It requires but little argument to prove that which common sense and every-day observation shows.—Whether the abdomen be opened by accident or by operation, as in that for hernia, we frequently see its effects manifested by a certain collapse of the general powers, and a corresponding degree of excitement which ends in inflammation. The exposure, too, which a large surface of omentum or intestine undergoes, must be injurious; the effect of the air upon them cannot be negative; and the diminution of temperature, or chilling, which they must, more or less, sustain, will have the effect of giving rise to a corresponding re-action highly dangerous to parts already in a susceptible state. On the contrary, the operation of dividing the stricture without opening the sac, places the parts nearly in the same condition as if they had been returned without the operation; for the flesh wound necessary to expose the stricture cannot be regarded as

probable source of inflammation of the peritoneal lining. Whatever diminishes the chances of inflammation, or its degree when it is excited, cannot fail to be beneficial, when we observe what a slight degree of peritoneal inflammation will destroy a patient after an operation,—when we see, after death, frequently, the peritoneum only more vascular than usual, without effusion, or any of those products which characterize the most active kinds of inflammation.

Like all other remedies or operations, it cannot have an universal application. Cases will frequently present themselves in which the operation is not practicable, or, if it can be performed, from the nature of circumstances attending it, will fail to relieve strangulation. The most favourable case, perhaps, for its performance is one of bubonocoele, where the hernia is of recent formation, and in which the tendon of the transversalis muscle, winding around the inner side of the sac, forms the stricture, and yet is not so blended with the neck of the sac that it cannot be readily felt and divided. An intestinal hernia, *cæteris paribus*, will be more readily returned without opening the sac than one consisting of omentum; the former slips up with very moderate pressure, when once a small portion leads the way and diminishes the volume in the neck of the sac; but the omentum lies so coiled up in a mass as not to be influenced by pressure made on the tumor, and although the neck of the hernial sac may be freed from stricture, the ball, if I may so term it, of omentum, is still with difficulty returned, because without introducing the finger into the sac it cannot be unravelled. This was the cause, as was afterwards ascertained, that led to the necessity for opening the sac in the case of Bessel. In large herniæ it is a very old, and a very judicious recommendation, not to expose the contents of the sac, as well from the difficulty of returning a voluminous mass of intestines, as from the danger of exposing a large surface of gut to the exciting causes of inflammation: in such old and large ruptures, the stricture being often at the external ring, the operation of dividing it externally to the sac is more easily performed.

Numerous, however, will be the cases in which leaving the sac unopened will either put the patient's life in jeopardy, or entirely fail to remove the stricture. The recent adhesion of the intestine to

the sac will prevent its return, and will require the cavity to be opened in order to detach the adhesions and return the gut. This, it is true, is rather difficult to ascertain before the operation is performed. I have generally found that 36 or 48 hours elapse before adhesion takes place, and during the process the tumor is remarkably tender, and free from serous effusion; if, therefore, the sac can be felt to contain fluid, it is a strong presumption against adhesion having taken place. I think, also, that a small enterocele is more disposed to adhere than the other forms of protrusion; while, on the contrary, omentum from recent strangulation is less disposed to the effusion of plastic lymph than of watery secretion. Another case requiring the opening of the sac is, when the long continuance of the strangulation, and the urgency of the symptoms, leads to the suspicion of gangrene having taken place in its contents. These symptoms I need not enumerate; but when a doubt exists, that doubt should at once be converted into certainty by examination of the intestine, as upon its condition will depend the propriety of returning it into the abdomen, or of leaving it in the sac. An old irreducible omental hernia, with a recent descent of intestine, forms another exception: the intestine cannot be easily disengaged from the omentum by pressure alone on the sac, and not unfrequently the old partial adhesions of the omentum to the sac entangle the intestine, and require division before the strangulation can be relieved. Such a state of parts we are led to understand from the previous history of the rupture. An irreducible intestinal hernia of long standing, without omentum, may perhaps be relieved without opening the sac: if the adhesions be very extensive, opening the sac will be of no service in assisting the surgeon to return it, as the propriety of dissecting them away may be questioned. The seat of stricture in congenital hernia of the tunica vaginalis so often differs from that of common inguinal hernia, that a doubt may be justly entertained as to the prudence of leaving a sac of this kind unopened: the partial adhesions, that form at the back and other parts of the sac are so liable to act as a cause of stricture, that I think it prudent to recommend the operation to be performed in the usual way, in preference to risking the entanglement of the in-

testine at the mouth of the sac by an adventitious band of membrane, which must escape notice, if the sac be not opened.

Such are the circumstances that appear to me to forbid the operation in question. But because there are some cases in which it is not practicable, this cannot be held as a valid argument against its performance, when it can be done without risk, and when its advantages are justly weighed. It is an operation in its performance less dangerous to the patient, by diminishing the subsequent chance of inflammation, and combines this great advantage, that, if from unforeseen circumstances it is found that the contents of the tumor cannot be returned, the sac may be opened, and the patient is precisely under the same circumstances as if the usual operation had been performed.

The operation necessarily differs in some minute particulars from that usually pursued; I will, therefore, briefly detail to you the steps. Instead of commencing the incision through the integuments just above or at the external abdominal ring, the connexion of the sac with the abdomen should be nicely ascertained, and from this point the incision should be carried down for about two inches,—or even less in many cases will suffice. In the present instance, the external ring being laid bare, and a small opening in the fascia attached to its margin being made, a director was then carried under the tendon of the external oblique, which was divided for about an inch. A similar division was made of the few fibres of the cremaster that were exposed, and also of the lower fibres of the transversalis, until the constricting band of the tendon of the latter muscle could be felt by the director, and also by the finger: this was carefully divided, so as to release the neck of the sac from its pressure. You observed that I then endeavoured to return the hernia, conceiving (and correctly as was afterwards proved) that I had sufficiently divided the stricture, but could not succeed. I then examined the neck of the sac, which was laid bare in order to see if any fibres remained undivided and opposed the return of its contents: in passing the knife to divide a few fibres of fascia transversalis, a small opening was made in the sac, and the operation was obliged to be finished in

the usual way, but without dividing the neck of the sac. The finger being passed into the sac, ascertained that the stricture had been most completely divided*; and the reason of the hernia not having been easily returned, was the mass of omentum that lay coiled up at the internal ring.

Now, gentlemen, it may appear strange that I should adduce an unsuccessful case in favour of a particular mode of operating. I conceive, however, that though the termination of the case was not successful, yet, had I completed my original purpose of not opening the sac, instead of finishing the operation in the usual manner, by opening its cavity, this man would have escaped the inflammation which led to the fatal result. So far, therefore, the event of the case rather confirms than otherwise the opinion I have been led to entertain of its utility. Would this man have died of inflammation, had the hernia been reduced without an operation? I apprehend not; for his symptoms were by no means unfavourable: the omentum may have been the exciting cause of inflammation, but had the peritoneal cavity been allowed to remain entire, inflammation would most probably not have been excited. The case, therefore, as it stands, is in my mind a strong argument in its favour, inasmuch as we have reason to presume that, by avoiding the opening of the sac, we might have prevented the subsequent mischief.

A second case having occurred last evening, in which a similar attempt was made to return the hernia without opening the sac, I shall conclude my present remarks by shortly mentioning the particulars. An elderly man, who had laboured under asthma for two years, and had been rendered incapable of working, was admitted on Tuesday evening with a strangulated bubonocoele on the left side. He had noticed two or three times a slight protrusion, but had never experienced any inconvenience from it, and had therefore paid no attention to it. The hernia appeared first to have passed the external ring, and from its form it had very much the character of a direct hernia. Its present descent, he said, arose from suddenly getting out of bed in the

* In answer to a question, Mr. K. stated, that he had rarely felt a stricture so freely divided as in this case, which fully proves the practicability of the operation.

morning, about eight o'clock, to light his pipe. His symptoms being urgent, with intermission of the pulse and tenderness of the belly, I placed him in the warm bath, and after some time endeavoured to return the gut; but finding the tumor exceedingly hard, and not the least disposed to yield, considering also that the stricture must be very tight, in consequence of its being a small and recently-formed hernia, and from the extreme urgency of the symptoms within the short period of sixteen hours, I thought it better not to defer the operation. The incision was commenced as in the former case, and the external abdominal ring divided in the same direction, so as to lay bare the tumor above the ring. I then endeavoured to find the strong margin of the transversalis tendon, which I expected to form the stricture, but to my surprise could not detect it; I then divided such tendinous fibrous as I found embracing the sac; but still the stricture was evidently as firm as ever, for the strictured neck of the sac could be seen tightly girt, without the constricting band being distinct to the eye or the finger. I concluded, therefore, that this was a case in which the edge of the fascia transversalis was acting as a cause of stricture, and that from its connexion with the sac it was so blended with it as to render any attempt to divide one without the other nearly impossible. I was aware of such a cause of stricture being very unusual; but, in the absence of the tendon of the transversalis muscle, and the stricture being an inch within what appeared to be the inguinal canal, there seemed to be no other satisfactory explanation of the circumstances of the case. I therefore opened the sac, and found a small exceedingly dark knuckle of gut tightly girt, and shewing by its appearance the necessity of its speedy release, in order to preserve its vitality. The stricture was as firm as if a string had been passed around the gut: it was divided directly upwards, and immediately a gush of fluid, evidently the result of ascites, took place. The gut, though dark coloured, was returned, as I conceived it still might recover its healthy condition, if the patient possesses sufficient constitutional power for the purpose, or is able to resist any inflammation that may supervene. This, however, appears doubtful; for although he has passed a tolerably good night, and has

had two copious motions, yet I cannot augur well for a case in which the patient has to contend with an inveterate asthma, with ascites and diseased liver as its probable cause, and certainly an unfavourable condition of intestine.

On the day subsequent to the preceding observations, the opinion entertained of this man's case was verified; inflammation came on, and quickly overcame the patient's feeble powers. The intestines presented the usual appearances of vascularity with opaque effusion; the portion of intestine still retained its dark tint, though its texture was firm, and its surface had lost its lustre. The liver was that of a man who had drank hard,—white and firm; the heart was enlarged somewhat, and the lungs loaded with carbon; the valves of the former were in several parts covered with a whitish deposit. Mr. Key then directed his attention to the seat of stricture, being by no means satisfied as to its precise nature. A little dissection tended soon to throw some light on the nature of the hernia, which proved to be one not of the ordinary kind. The cord was found to take its course from the inner abdominal aperture entirely to the outer side of the hernia, which had not descended through the inguinal canal. The hernia appeared to be one of the direct kind on the inner side of the epigastric artery; the expanded tendon of the transversalis muscle had yielded to the pressure of the hernia, and had allowed it to protrude between its fibres: these latter formed the structure, by embracing the neck of the sac: they were exceedingly small, disgregated, and embedded in the stricture, which they had formed. The fascia transversalis had been protruded before the peritoneum, so that the intestine was contained in a double sac, and between the two a layer of adipose structure was interposed, in the same manner as we often find it in the healthy state. The difficulty of dividing the stricture without opening the sac was here made apparent and accounted for, as was also the difficulty of recognizing the hernia as one of the direct kind. The cord not being visible during the operation, the epigastric artery being at least an inch to the other side of the stricture, and the stricture being situated nearly an inch above the external ring, naturally led to the belief that the hernia

was of the oblique kind. The only point of difference from a common hernia perceptible during the operation was the absence of the bold margin of the transversalis tendon, which can usually be felt on the inner side of the neck of an oblique hernia. The case is peculiar in the stricture not being situated at the external ring, but as much above it as we usually find even in oblique hernia.

REMARKS
ON
CHANGES OF STRUCTURE,

BY JOHN BARON, M.D. F.R.S.

Physician to the General Infirmary, and Consulting Physician to the Lunatic Asylum at Gloucester, &c. &c.

To the Editor of the London Medical Gazette.

SIR,

SOME observations which have recently appeared in your Gazette, render it necessary that I should address you. Be assured that I do so with great reluctance, and, had not considerations very different from those that are merely personal influenced me, I certainly should have remained silent.

My object will, perhaps, be best attained by placing in your journal certain extracts from works of mine published several years ago: they will at once declare the design of my inquiries, the spirit in which they are conducted, and the conclusions to which they led.

After tracing the history and character of that tuberculous affection of serous membranes which forms the first part of my "*Inquiry*," I proceeded to investigate the origin of tubercles, and other morbid growths of that genus. In doing so, I observed that "almost all recent physiological and pathological doctrines have been so exclusively founded upon certain views of the sanguiferous system, that some effort is required to avoid assigning to it more than its due share of influence in inquiries of this kind. The changes on membranous surfaces have been especially ascribed to inflammation. But this is not all: for even though we are not agreed respecting the nature of inflammation itself, in any of its stages or degrees, we do not hesitate to render our speculative notions the basis of our reasoning; when we contemplate the

origin of tumors, or the various disorganizations that are visible in the different viscera. It is of very great consequence to acquire precise notions on this subject, to find out what may justly be referred to inflammatory action of whatever sort it may be, and what ought to be attributed to a different agency. It is with a view of laying this question before the reader that I bring forward the following facts and observations."—Vide "*Inquiry*," p. 69.

Again, I write thus:—"In the eyes of some pathologists the powers of inflammation are unlimited. It forms, by the aid of coagulable lymph, cysts and tumors, and all the varieties of diseased texture, that dissection constantly exposes to our view. The same convenient form of reasoning is the one which naturally occurs on the present occasion. But a little reflection will show how erroneous, how unsatisfactory it is."—Vide "*Inquiry*," p. 72.

What I had seen of the progress of morbid changes taught me that the opinions (referred to in these extracts) were incorrect. I therefore in the first place endeavoured to prove to others what I myself believed to be true, concluding this part of my subject thus—"Nothing that is known, either of the physiology or pathology of the sanguiferous system, seems capable of explaining what we are now in quest of: we must therefore direct our attention to another part of our structure."—Vide page 81. The purpose of so doing was to find out, if possible, the principle that regulated the growth of tubercles and encysted tumors of various denominations; to trace their origin and progress, and their affinity with each other. In seeking for information to illustrate these matters, I was necessarily led to consider the primary or elementary condition of these disorganizations, and obtained information which I then thought, and still think, sheds a steady light on the most intricate of pathological subjects. It was demonstrated that the incipient state was very different from that exhibited to us on *post mortem* examination; that the course of these changes of structure in no respect accords with our commonly received doctrines; and that they depended upon a principle altogether opposed to them. My intercourse with the venerated Jenner, and my examination of the writings of the

most eminent of our brethren, together with my own observations, gave unquestionable proof of the truth of these positions, and produced the statements which I have at different times published.

In order to convince others, I brought together a number of pathological facts which, some how or other, had been overlooked. Passages of the following description had great weight with me, and enabled me to find my way with something like certainty through a very perplexing investigation:—"Atque ita quidem harum nos rerum contemplatio ad *hydatidas* sensum speculatione hac deduxit. Qui sphaerici tumores liquida primo turgent lymphæ, sensim degenerante juxta varios in colore et crassitie mutata modos."—Vide *H. Boerhaave Epistol. Anatom. ad Fr. Ruysch*, p. 73.

Some expressions of De Haën, in his chapter *De Hydropæ Cystico et Hydatidibus*, page 285, spoke language still stronger. "In cadavere horrendam mole thyroideam glandulam nactus publicè dissecui. Mecum auditores mirabantur nullam fere genus tumorum dari quin in hac sola thyroidea inveniretur. *Hic enim steatoma, ibi atheroma, alio in loco purulentus tumor, in alio hydaticus, in alio erat coagulatus sanguis, fluidus fere in alio, imo hinc glutine locus plenus erat; alibi calce cum sebo mista,*" &c. Again, the following from Boerhaave go strongly to the same point:—"Qui tumores frequentissime et fere ubique in exterioribus, vel et interioribus corporis deprehensi a primo initio in ultimum incrementum usque successive juxta gradus crescendi et varia interim nata phenomena inspecti adeo clare docent quod malum hoc sit a materie lentescente in proprio suo nativo cavo sensim dilatato, *ut liber præjudiciis; reique guarus aliter censere nequeat.*"—Vide *Boerhaave ut supra*.

After detailing at length the facts above alluded to, and having traced the morbid growths, *a primo initio ad ultimum incrementum*, and having proved that they were "sphaerici tumores liquida primo turgent lymphæ," &c. I remark as follows:—It has now been demonstrated that hydatids are the causes of many changes of structure; and their connexion with morbid states of the lymphatic system has been traced by a series of analogical and collateral circumstances, which have almost the

force of a direct and satisfactory chain of evidence. They illustrate the origin and progress of a great variety of the most fatal and alarming chronic diseases, which cannot be accounted for by any doctrines now in vogue, without involving the reasoner in the most palpable contradictions and inconsistencies.

The design of these quotations is to prove that I employ the word *hydatid* in the same sense in which it has been used by the most eminent pathologists. From first to last I have been treating of the same objects, endeavouring to elucidate the mutations which they undergo, and the consequences which they produce. It is true that I *did* touch on the zoological part of the question, and stated the irrefragable proofs acquired by Dr. Jenner. I likewise alluded to the controversy that had been carried on respecting the origin of hydatids, and the opinions that had been expressed on the supposed influence of the vitality of these bodies in producing disease. But I soon discovered the necessity of separating the pathological inquiry from all these matters. To prove that I employed the word *hydatid* in the legitimate meaning, I described it as a "*vesicular body with fluid contents*;" and the whole of my subsequent inquiries and illustrations were directed to prove the connexion between these *vesicular or encysted bodies*, and the many disorganizations which they occasion. I put forward this definition in a prominent part of my second publication, (as may be seen at page 4), and in my *third* I expressly declared that I substituted the term *vesicle*, as much as possible, instead of *hydatid*; and that I never employed the latter but in its etymological sense. I did this to prevent the cavilling which I foresaw would arise concerning the different ideas attached to that word. But while I acted thus I never intended to give up the position that hydatids, strictly so called, have a great effect in producing alterations of structure, both in man and in the inferior animals. The proofs of this fact are abundant and irresistible. Such was the opinion of the greatest pathologists; and, were this a fit occasion, it might be demonstrated that there is a closer connexion between these bodies, and what are now called *cysts*, than some are willing to admit. They often exist together in the same morbid

growth; nay more, a cyst, as some call it, is frequently found to contain *hydatids*. For the present, however, I leave this part of the subject, and return to what was really the main object of my pursuit.

Having satisfactorily made out the primary condition of certain disorganizations, I endeavoured to apply the principle to the elucidation of other morbid growths which, unhappily, occur so frequently. By availing myself of such opportunities as presented themselves, and by consulting the works of others, I found that much more light could be thrown on this subject than I had, at first, anticipated. In disorganizations, particularly, of a compound nature, indications of the different steps in their progress may often be detected. In one part of a viscus the *first* deviation may be seen; in another it may be more advanced; in a third it shall have proceeded still further. It sometimes happens, likewise, that one tumor shall be made up of a great variety of different parts and textures. These and similar phenomena induced me to attempt the explanation of such appearances by reference to the ascertained state of their elementary parts; and I concluded in these words:—"Proofs and illustrations of this opinion may be drawn from the works of every author who has written on this class of diseases. They differ as much about their origin as they do about their names; but neither of these circumstances can affect this discussion: cases of cancer, of tuberculated sarcoma, of fungus hæmatodes, and many other varieties of morbid growth, may be demonstrated by the very descriptions, which the authors themselves give, to have been formed as I have described." The principle involved in this last quotation was deduced from much inquiry; and it is demonstrably true, whatever doubts or difficulties may occur in other parts of the subject. It pointed clearly and distinctly to the primary or incipient condition of the changes of structure; and induced me to declare that in our discussions we had inverted the order of nature, placing that first which was probably last; and drawing inferences which were necessarily deceptive. We seldom in the human subject see disorganizations till the parts concerned are so altered by the progress of the disease as to render it impossible to

form any correct conception of the primary changes, which, when not checked, lead to fatal results. I therefore urged the necessity of beginning with the *first* link of the chain instead of the *last*; and, after long examination, I summed up my sentiments in the following words:—"From a due consideration of this and other kindred diseases, I contend that an inflammatory process is not that by which they are generated. There is the most conclusive evidence that *cysts* and *sacs* are not formed by the effusion of coagulable lymph around the diseased mass; or that the various appearances of these cysts, whether they be thick and firm, or slender and transparent; whether they be ossified, or show no signs of such a state; whether they contain a clear and watery substance, or a thick gelatinous purulent-looking matter; or be half fluid or wholly so; or exhibit any of the above-enumerated appearances, in any variety of combinations; there is, I repeat it, the most conclusive evidence that such occurrences are not the result of any process analogous to inflammation. Farther, I maintain that whether there be one such body, or more than one; whether it be large or small; whether it be attached to the membranes, or be imbedded in the brain itself, that all have *one origin*; and that it is common to the whole class of similar disorganizations in every part of the body."—See "*Illustrations*," page 188.

The object of the preceding, as well as of many other passages which might be quoted, was to prove that the *cyst* or *sac* is the part first developed; and that the character and consequences of such disorganizations depend upon the number, size, situation, relative position, and contents of their elementary parts.

I then alluded to the confusion which has arisen from not keeping in mind the difference of diseases occasioned by the growth of "*adventitious bodies*," and those wherein no such alterations of structure have taken place. I proceeded thus,—"It was one great object of my inquiry to mark the boundaries between these two classes of diseases. It little concerns me, at present, to speak of the *origin* of the *various adventitious bodies* which alter the structure of animals. It matters not to what cause they are assigned, provided it be kept clear from those other disorganizations which

are the result of diseases independent of any previous alteration in the healthy texture. If this distinction be observed, we can see our way clearly and distinctly through many intricate pathological questions; if we forget it, there is nothing but inextricable confusion and contradiction. This division does not involve any theoretical questions at all; and would not lose any degree of its importance were all the other opinions which I have endeavoured to enforce proved utterly groundless. It rests upon facts which every one may ascertain; and, numerous and decisive as they are, it is wonderful that they ever should have been overlooked." (*Ut supra*, p. 197.)

I have selected almost all the statements and quotations given above from my first work, which was published more than ten years ago, for the express purpose of proving that no after-thought, arising from existing circumstances, has had any effect in inducing me to alter or modify opinions which were not adopted without mature consideration. The facts which I have since published have all tended to confirm and illustrate the main principles. The doctrine touching the inflammatory origin of the disorganization of which I have treated, has gradually yielded; and there are few men of any character in our profession who do not now admit that another, *and a different*, principle is concerned in their production. I need not tell you how vehemently this truth has been opposed. I doubt not, therefore, that other points of doctrine, which are certainly as well founded, will ultimately be equally triumphant. The discussions, indeed, which are at this moment going on, argue well for this conclusion; and when men cease to be deluded by words, and look to realities and facts, our differences, perchance, may cease also. Sure I am that I shall rejoice, let *truth* come from what quarter it may; for I would rather have it prevail, even were it to bring the overthrow of all my most cherished sentiments, than see error maintained for a single hour.

I have abstained from dwelling on the doctrines that necessarily flow out of the principles that have, I think, been established. They rest upon evidence beyond the reach of mere verbal criticism, or speculative discussion. The objects themselves have been described, have been represented by the best writers in our profession, in such a manner

as to set all disputes respecting their identity at defiance; it is needless, therefore, to quibble about *names* where the *realities* are so manifest. If it were not to occupy too much of your space, numberless are the illustrations that might be given of these truths; but I trust enough has been said.

In conclusion, I ought to thank your correspondent, the "*Morbid Anatomist*," (who, by the way, has chosen a *designation* singularly appropriate,) for his extraordinary courtesy and kindness to myself and my provincial brethren. I really know not how to express what is due on this occasion; but what I cannot say for myself, may be adventured in a friend's behalf. The admirable Jenner, too, was a benighted blunderer! He did not know the difference *between an abscess and an encysted tumor*. Alas, for the Bœotian intellect of the poor ill-fated provincials! Perhaps, in kindness, you may hint to your "*Morbid*" correspondent that an abscess, properly *so called*, never is *encysted*; that when an *abscess is formed it is quite after a different fashion from that process which gives rise to a cyst*. When he shall have learned this and other points, possibly he may discover that all the blunders are his own.

I am, Sir,

Your obedient servant,

JOHN BARON.

Gloucester, July 4, 1829.

SCROTAL HERNIA.

To the Editor of the London Medical Gazette.

SIR,

ALTHOUGH the following case did not come under my own especial notice, yet I was induced to take short notes of it, thinking it in many points very interesting: if you deem it so, you will oblige me by inserting it in a corner of your valuable journal.

I remain, Sir,

Your obedient servant,

JOHN HEWSON.

Lincoln, July 4th, 1829.

John Westfield, aged 55, of spare habit of body, admitted late in the evening of Thursday, May 28th, 1829, under the care of my colleague Mr. Boot, senior surgeon to the Lincoln County

Hospital, for a scrotal hernia of the left side. The tumor is of a pyramidal shape; the integument covering the herniary tumor has a natural appearance; is inelastic; but the taxis produces a gurgling noise, as in intestinal hernia; considerable pressure upon the tumor occasions no pain; he has hiccup, and eructations of air, with cold extremities. He states that he has been affected with a rupture for the last thirty years, which has usually been of the size of a pullet's egg. Early on Monday morning the 18th, whilst in the act of throwing stones into a cart, he perceived the hernia suddenly to enlarge, more so than he had ever known it before: this was followed by slight pain of abdomen, and nausea: he has passed no stool since the Sunday (17th) preceding the descent of the hernia; prior to admission into the hospital, he vomited daily, and had pain of abdomen, with fever.

He was immediately bled to 16 oz. which produced fainting; but the taxis failed to make any impression on the tumor. Cathartic clysters were given, with castor oil, which produced two slight evacuations, and cold was directed to be applied to the swelling.

May 30th.—Restless night. Pulse 80, small and thready. He continues to vomit, and the egestie have a decidedly faecal character; no further evacuation by the anus; very little tension of the abdomen, on which pressure produces little or no uneasiness, but on the neck of the sac it produces pain; cold had been applied to the tumor, but was omitted at the patient's request, in consequence of its causing considerable pain; body and extremities cold. Ordered to have a cordial mixture, and cathartic clysters every four hours.

31st.—Bad night. Pulse 80, very small and thready. Hands and face very cold. Generally lies upon his left side; when lying on his back, he invariably begins to vomit; the clysters return unaltered.

June 1.—Has passed a very restless night. Pulse 80, very feeble. Constant eructations of air. Complains of more pain across the region of the bladder, and along the course of the transverse arch of the colon. Vomits much stercoraceous matter. No stools.

2d.—Has had a better night, with less vomiting. Can take nothing but a little wine and water.

3d.—In every respect the same. Has

had a purging stool. Pulse 80, small and thready.

4th.—Slept but little; was not restless. Pulse 84, scarcely perceptible. He constantly lies upon his left side, with the trunk bent. He is gradually sinking.

5th.—Died at 7 o'clock this morning.

Post Mortem Examination 5 hours after death.—On opening the cavity of the abdomen, sero-purulent fluid was observed between the agglutinated folds of inflamed intestine; the great omentum twisted together, as if slightly encircled with a string; the whole of the intestinal canal exhibiting marks of inflammation, and distended with air and faeces. The arch, ascending and descending portions of the colon, were more particularly inflamed and distended; the peritoneum lining the abdominal muscles not inflamed; the common integuments of the herniary tumor quite natural in appearance; the fascia superficialis and sac much thickened, the latter contained very little fluid; the sac contained a considerable portion of omentum, about the size of a turkey's egg: this was healthy in appearance, slightly inflamed, and adherent to the mouth of the sac only. No intestine was found in the sac, but a portion of the ileum had become adherent to the omentum by its peritoneal surface at the mouth of the sac. This portion of intestine had a very dark appearance, but it regained its natural colour after immersion in spirits of wine. The calibre of the gut was not at all diminished or interrupted. The hernia was congenital, the omentum in the sac being in contact with the testicle.

As the omentum had a healthy appearance, I am of opinion that the adhesions were formed in consequence of the last descent of omentum, and that this case distinctly points out the danger of allowing omentum to remain for any length of time in the sac of a hernia. In the *Medico-Chirurgical Review*, July 1st, connected with a review of Mr. Stephens's work on *Hernia*, I find the following passage inserted by the Editor of that valuable journal, p. 113:—

“No doubt can exist, nor indeed has at any time existed, that bowels confined by adhesions in hernial sacs will not go on with their natural functions so freely as when loose and floating in

their native cavity. But the question is, will adhesions, *per se*, occasion a fatal obstruction to the office of the gut? Mr. Stephens says they will; and the issue is with him and his surgical brethren. For our own parts we doubt whether such be the case; nor can we imagine that a patient will die from this cause alone. The case is very different when the adhesions are so arranged as to act like a stricture in the gut, or when the latter is so placed as, by being convoluted in itself, or on any other manner to prevent the egress of matters from its cavity."

In the above case there was no stricture or diminution of the calibre of the gut, but a simple adhesion between the omentum and intestine, yet this proved amply sufficient to produce derangement of the functions of the alimentary canal, and ultimately death, with all the symptoms of incarcerated hernia.

ANALYSES & NOTICES OF BOOKS.

"L'Auteur se tue à alonger ce que le lecteur se tue à abrégér."—D'ALEMBERT.

Of the Irritable Uterus.

(Being the conclusion of the Analysis of DR. GOOCH'S Work on the Diseases of Women.)

THE name of irritable uterus is applied to a painful and tender state of the organ, neither attended by nor leading to organic change. At first, the author took this for chronic inflammation, and was alarmed for the consequences; but after a time he became less apprehensive of the result, having known cases in which it has lasted above ten years without causing any disorganization. He thus describes the complaint:—

"Pain in the lowest part of the abdomen and loins attends various diseases of the unimpregnated uterus. It is the chief symptom in painful menstruation; but here it occurs only during the menstrual period, and is quite absent during the rest of the month. It is the most distressing symptom in descent of the uterus (prolapsus), but here it occurs only in the upright posture and exercise, ceases on lying down, and replacing the organ, and is prevented by supporting it in its natural situation. It attends most of the diseases of structure

to which the uterus is liable; but the change of structure, which may be ascertained by examination, distinguishes the nature of the pain.

"A patient who is suffering from the irritable uterus, complains of pain in the lowest part of the abdomen, along the brim of the pelvis, and often also in the loins. The pain is worse when she is up and taking exercise, and less when she is at rest in the horizontal posture: in this respect it resembles that of prolapsus uteri, but there is this difference—that in the latter, if the patient lies down, she soon becomes quite easy, but in the complaint of which I am speaking, the recumbent posture, although it diminishes, does not remove the pain. It is always present in some degree, and severe paroxysms often occur, although the patient has been recumbent for a long time. If the uterus is examined, it is found to be exquisitely tender; the finger can be introduced into the vagina, and pressed against its sides without causing uneasiness, but as soon as it reaches and is pressed against the uterus, it gives exquisite pain. This tenderness, however, varies at different times, according to the degree of pain which has been latterly experienced. The neck and body of the uterus feel slightly swollen, but this condition also exists in different degrees, sometimes sufficiently manifest, sometimes scarcely or not at all perceptible. Excepting, however, this tenderness, and occasionally this swelling, or rather tension, the uterus feels perfectly natural in structure; there is no evidence of schirrus in the neck, the orifice is not misshapen, its edges are not indurated. The patient, finding her pain greatly increased by rising and walking, soon learns to relieve herself by lying on the sofa, and at length spends nearly her whole time there. Notwithstanding this precaution, there is always a considerable degree of uneasiness, but this frequently increases to severe pain. These paroxysms generally come on either a few days before menstruation, or (as is the case in many instances) a few days afterwards. If the paroxysm is properly treated, it subsides in a few days to the ordinary and more moderate uneasiness. Whilst this uneasiness is felt in the substance of the uterus, the general circulation is but little disturbed. The pulse is soft, and not much quicker than is natural; but is easily quickened by the

slightest emotion. In a few instances, however, there has been a greater and more permanent excitement of the general circulation; the degree in which the health has been reduced has been different in different cases. A patient who was originally delicate, who has suffered long, and has used much depleting treatment, has been (as might reasonably be expected) the most reduced; she has grown thin, pale, weak, and nervous; menstruation often continues regular, but sometimes diminishes, or ceases altogether; the functions of the stomach and bowels are not more interrupted than might be expected from the loss of air and exercise; the appetite is not good, and the bowels require aperients; yet nothing more surely occasions a paroxysm of pain than an active purgative. Such are the leading symptoms of this distressing complaint. To embody them in one view, let the reader fancy to himself a young or middle-aged woman, somewhat reduced in flesh and health, almost living on her sofa for months, or even years, from a constant pain in the uterus, which renders her unable to sit up and take exercise; the uterus, on examination, unchanged in structure, but exquisitely tender; even in the recumbent posture always in pain, but subject to great aggravations more or less frequently."

The causes to which this affection appears to be attributable, are bodily exertions at times when the uterus is in a state of susceptibility. Most of the patients, too, have been previously subject to painful menstruation. Although not attended with change of structure, the disease yields but very slowly to remedies, and even when recovery at length takes place, there are long intervals in which the progress made is "most unsatisfactory and dispiriting."

Dr. Goode regards this as a nervous affection resembling a state which has been described as occurring in other organs, such as the breast, the irritable tumor of that part*; and the joints, in the state called by Mr. Brodie "a local hysterical affection" of these parts†. The points of resemblance are, that these complaints attack similar kinds of consti-

tution, produce pain and tenderness, simulate organic disease, and prove to be only functional disturbance.

The indications of cure are, first, to subdue local pain; secondly, to restore general health. With a view to the former, the horizontal position, narcotics, the hip bath, occasional local bleeding, and counter-irritants, are recommended. Great stress is laid upon the absolute observance of rest: if the pain is perpetual, repose should be perpetual. For this purpose, not only exercise of every kind, but even the erect position, must be entirely abandoned, and the patient placed, as soon as she is dressed, upon a sofa, with the shoulders as low as the pelvis. When the general circulation is undisturbed, local is to be preferred to general bleeding, and cupping is more beneficial than leeching. Where this last is adopted, the leeches ought to be applied to the hemorrhoidal vessels, or between the labia. Twelve ounces may be considered as a large local bleeding, and occasionally all the relief that this remedy is capable of affording may be obtained from one-third of that quantity. So long as these depletions give decided relief to the pain, and do not weaken the system too much, they are to be persevered in; but where the disease has lasted long, the relief is often very slight, and the debility which the remedy occasions great. Under such circumstances it must of course be abandoned.

The most useful narcotics are one-third camphor and two-thirds of the extract of hyoscyamus, conium, or poppy, divided into five-grain pills, of which one may be taken two or three times a-day. Another mode of applying an anodyne is to dissolve ten grains of extract of poppy in an ounce of gruel, and throw it up into the rectum every day, after the bowels have acted. As these remedies, viz. rest and narcotics, are apt to produce constipation, aperients must be occasionally administered, and a preference is to be given to those which are least irritating, as castor-oil, sulphur, senna electuary, &c.

The warm bath, hip bath, sometimes affords much relief; at other times it fails to mitigate the pain, while it increases the general debility. The best kind of bath is said to be the partial application of steam; a sack being so adjusted as to enclose the abdomen and

* See Sir A. Cooper's work on Diseases of the Female Breast.

† Brodie on Diseases of the Joints, p. 338.

lower extremities, which are to be exposed to the action of steam for half an hour every other day.

Mercury is spoken of with considerable reserve. It seems chiefly to have been useful where the local disease had not been of long standing, and where the health had not been much impaired. Sometimes, though it has had a favourable effect upon the local disease, it has occasioned so much wasting and nervousness as to render its discontinuance unavoidable. "Mercury (continues our author) requires to be employed with the utmost circumspection, and its effects in each individual case ought to determine whether it should be persisted in or discontinued."

Counter-irritation is also of occasional benefit; such as flying blisters about the size of a watch, or an issue, at the upper part of the sacrum. But as these remedies sometimes produce constitutional disturbance, without any equivalent benefit, they must be employed with circumspection.

When the disease has lasted long, and the health is much broken, restorative means become of service: of these, the best are said to be chalybeate waters—as those of Tunbridge Wells, or Bath. With a view of conveying a more vivid picture of the history and treatment, we subjoin the following case:—

"A lady came to London and placed herself under my care, giving me a written narrative, of which the following is an abridgment. It affords a good instance of the duration of these cases, of their liability to relapse, of the fears which they occasion, of disease of structure, of the groundlessness of these fears, of the imprudence of patients, notwithstanding repeated suffering and after years of illness, of their ultimate recovery.

"Mrs. — is now thirty-six years of age; from seventeen she suffered pain at every menstrual period, but in other respects was healthy and rather plump. At twenty-four she married, and after her first confinement went to a fashionable watering-place, and there passed a winter of laborious gaiety, her mornings being spent in making calls, and her evenings standing in crowded parties. She lost her appetite, suffered much from languor, and became subject to shooting pains at the lowest part of the abdomen. One day she went on an excursion into the country, during

which she was compelled to hold her urine for six hours. In the evening she took a long walk, towards the end of which she was seized with severe pain and weight in the lowest part of the abdomen, and a sense of fulness in the womb. She applied leeches, lived low, and was confined to her sofa several weeks, at the end of which time she was supposed to be well; but when she attempted to walk or ride, she felt a return of the pain: nevertheless she took a journey of forty miles, during which she suffered much; the pain was always worse at the menstrual period. Whilst in this state of imperfect recovery she took a drive in a donkey-cart, which was followed by a violent relapse, with great pain and tenderness across the lowest part of the abdomen. She was now confined to her bed, and was bled from the arm four times in one week. At the end of eight weeks she removed from her bed to her sofa, and in three weeks more went out in her carriage, and soon afterwards travelled to ——. She suffered pain during the journey, was not so well on her arrival, and consulted Mr. —, who examined the uterus, which he described as enlarged and tender.

"The narrative now goes on to recount a succession of relapses, all brought on by bodily exertion or agitation, when in a state of imperfect recovery; one by the jolting of a carriage in a long journey, another by driving in a rough donkey cart, another by cantering for a full hour one day when the weather was fine, and she in high spirits, another by yielding to the solicitations of her friends, who assured her that she ailed nothing, and pressed her to exert herself to the utmost, and live like other people. This was to make daily calls from one o'clock to half-past four, up and down the steep streets of —, and going to parties in the evening, where she stood most of the time. For the attacks of pain the principal remedies were strict rest in the recumbent posture for several weeks, and blood-letting, either general or local. On one occasion she was bled from the arm four times in one week; twice she became pregnant, and was delivered prematurely of children who had died some time before their birth. The uterus was often examined, and was always found to be tender, sometimes enlarged; on the last examination some irregu-

larity was felt in the neck of the uterus, which led to apprehensions of disease of structure. Tired of remedies which had afforded such temporary benefit, she continued twelve months without any medical attendant, using no means excepting rest, occasionally going out, but at the end of this time she was not better; her pulse was full and quick, her pain worse, and subject to periodical aggravations. These attacks came on with, first, low spirits, then shivering, followed by sickness, head-ache, and throbbing pain of the uterus. Nothing relieved them but leeches; she was always the worse for carriage exercise, and for anxiety of mind. She now set off for London in a horizontal carriage: on her journey she met her former medical attendant, who had not seen her for many months, and who acknowledged she was not better than she had been eighteen months before; she therefore pursued her journey to London, and placed herself under my care. I found nothing unnatural in the form or consistence of the neck of the uterus, except a very slight irregularity in its orifice, which I have often observed in patients who ultimately recovered; but it was exquisitely tender, and the increased pain occasioned by the pressure of the finger lasted several hours. She had always some dull uneasiness along the anterior brim of the pelvis, but once every week or ten days she had a greater degree of pain, which generally lasted several days, and when it ceased, left behind the ordinary and more moderate uneasiness. She was not deficient in flesh or complexion, her pulse was always about 90, full and strong. After two bleedings of twelve ounces each, which produced excessive languor, without abating the pain, or the disturbance of circulation, she took a grain of calomel and five grains of extract of henbane, twice daily. In about ten days her gums became sore, and continued so for several weeks; immediately the disturbance of circulation ceased; the pulse was slow and soft, and never resumed its former excitement. The pain likewise became considerably less, and the paroxysms came on at longer intervals; when they did, they were relieved by cupping, and by solutions of extract of poppy injected into the rectum, immediately after the bowels were moved. For a long time her plan of treatment consisted in

strict confinement to the horizontal posture, a daily dose of sulphate of magnesia, just enough to excite one plentiful action of the bowels, and no more; and then a small poppy clyster, with an occasional cupping. I have not room, and it would be tedious to relate the whole progress of this case; it is enough to say, that the permanent uneasiness gradually became less, and that the paroxysms of pain became seldomer and slighter; after both the one and the other appeared to have ceased altogether, there were occasional returns of pain, which showed that the disease was not eradicated. After these symptoms had entirely ceased, she continued for many months the same plan, with the exception of blood-letting. At length she was removed in a horizontal carriage a little way out of London; here, having learnt prudence from her former relapses, and having no relations about her to urge her to exertions, she began to make gradual, even timid, attempts to sit up and walk about. At first, she walked with a watch in her hand; the first day for a very few minutes, adding one minute every day to the length of her walk. When at home, she generally reclined on her sofa, sitting up only at meals, and this for a short time. At the end of a month of cautious exercise, her health, which had become feebler, was greatly improved; she has been living most cautiously ever since, and has now been perfectly well nearly two years.

“This case was written out three years ago; the patient has had no recurrence of her disease, although she has since sustained a heavy and lasting affliction. She is in good health and can walk, drive, ride, and live like other people; but she has never since been pregnant.”

Peculiar form of Hæmorrhage from the Uterus.

Bleeding from the uterus after delivery, is attributed to insufficient contraction of that organ. But there does not seem to be any proportion between the degree of contraction and the extent of hæmorrhage; for sometimes there is a bulky uterus and little bleeding, at others copious bleeding without greater bulk of uterus. Sometimes a profuse hæmorrhage will take place from a uterus which has contracted as much as is usually necessary for safety;

and, on the other hand, the author has separated the placenta before the uterus contracted, without inducing more hæmorrhage than in a common labour. As, after delivery, the contraction of the uterus prevents hæmorrhage, by producing a closure of the blood-vessels sufficient to resist the ordinary force of the circulation, the author thinks it reasonable to suppose that, if the force of the circulation become *extraordinary*, it may overcome the *ordinary* closure of the vessels, and thus give rise to hæmorrhage. The following interesting and instructive case illustrates this idea extremely well, while it is an excellent example of the kind of hæmorrhagic tendency which forms the particular object of the paper.

“April 10, 1815, I delivered Mrs. S. W. of her second child; for many hours before the accession of labour she was flushed, and had a very full quick pulse. Abstinence from meat, wine, and warm drinks, a cool room, and a saline purgative, diminished, but did not remove, this state of the circulation, which continued in a considerable degree when the child was born: it was expelled very gradually, and, after the removal of the placenta, the uterus felt in the hypogastrium contracted in the ordinary degree; nevertheless, about twenty minutes afterwards there came on one of the most frightful hæmorrhages I ever witnessed; by the introduction of the hand, and the application of cold, however, it was speedily arrested.

“It was somewhat more than a year afterwards when she informed me that she was pregnant again, and coming to town to lie in. As she arrived only two or three days before she fell in labour, I did not see her till she was taken ill; but then, as soon as I entered her chamber, I was struck on observing the same state of circulation that had preceded her former labour; she was sitting in her easy chair, with a red face, and a throbbing pulse. I had not been many minutes in the room before the pains became so strong, it was necessary to put her on the bed, and soon after the child was born: it could not be expelled more gradually: after the head was born another pain expelled the shoulders, another the body, and another the limbs. I cut the cord, placed my hand on the abdomen, and felt the uterus contracting in the usual degree;

yet a few minutes afterwards the blood burst out with prodigious impetuosity. The fearful scene which followed, I need not depict; it is enough to state, that by the introduction of the hand and the application of cold, the hæmorrhage was speedily suppressed, yet it bleached her face, and for many days she could not sit up without faintness.

“I had now witnessed two labours in the same person, in which, though the uterus contracted in the ordinary degree, profuse hæmorrhage had nevertheless occurred; let me be understood — after the birth of the child, I laid my hand on the abdomen, and felt the uterus within, of that size and hardness which is generally unattended by, and precludes hæmorrhage; in both instances the labour had been attended by an excessively full and rapid circulation. I could easily understand that a contraction of the uterus, which would preclude hæmorrhage in the ordinary state of the circulation, might be insufficient to prevent it during this violent action of the blood-vessels, and the inference I drew was, that in this case the hæmorrhage depended not on want of contraction of the uterus, but on want of tranquillity of the circulation, and that if ever she became pregnant again, a mode of treatment which would cause her to fall in labour with a cool skin and a quiet pulse, would be the best means of preventing a recurrence of the accident.

“It was not very long before I had an opportunity of trying the truth of my doctrine, and the efficacy of my treatment, for about twelve months after this confinement, she called on me to tell me that in about four months she should require my attendance again.

“The plan I advised was this, to avoid fermented liquors; to take meat only thrice a week; a purgative of salts and senna twice a week; a scruple of nitre three times a day: this she began two months before she expected to be confined, and continued it up to the full time. I saw her when she was expecting her labour every hour, and had the satisfaction to find her with a cool skin, and a soft pulse under 80. She was to lie in at her own house, a few miles from town; I was to attend her there: for fear I should not arrive in time, the neighbouring surgeon was to be in the house. I was sent for four days afterwards; when I arrived she

was not delivered; but I was mortified to find, that since our last interview, her pulse had sprung up, and there was now the old heated skin and hurried circulation, though in a far less degree, and this the surgeon said had been the case for two days. The labour came on, the child was gradually expelled, and after the placenta had separated and was removed, the surgeon had put his hand on the abdomen, and said he had seldom felt the uterus more contracted so soon after delivery; yet within a few minutes there came on a flooding; like what I believed to be the cause, it was trifling to what I had formerly witnessed, and was readily suppressed by a cold wet napkin flapped upon the belly; but it was enough to produce syncope, and detain us in the house several hours longer than we should otherwise have remained there.

“In process of time she became pregnant again. She pursued the same plan, with only this addition, that when she came within a fortnight of her confinement, she had twelve ounces of blood taken from her arm, and before a few days of delivery, eight ounces more. She fell in labour, and as soon as I entered the chamber, the first thing I did was to feel her pulse; it was as soft and slow as I could wish. After the birth of the child and the removal of the placenta, the uterus contracted not more than in her last labour; but not the smallest degree either of flooding or faintness took place.”

And again—“The first time I attended this lady, after the violence of the hæmorrhage was over, although the abdomen was covered with pounded ice, it returned again and again, slightly in degree, yet sufficiently, in the debilitated state of the patient, to produce alarming recurrences of faintness; the uterus too, which had become firm and distinct, became so soft it could no longer be felt. In the hæmorrhages from the uterus, these alternations of contraction and relaxation, with cessations and recurrences of bleeding, are familiar to the observing practitioner. Finding the ice so inefficient, I swept it off, and taking an ewer of cold water, I let its contents fall from a height of several feet upon the belly; the effect was instantaneous; the uterus, which the moment before had been so soft and indistinct as not to be felt within the abdomen, became small and hard, the

bleeding stopped, and the faintness ceased; a striking proof of the important principle, that *cold applied with a shock, is a more powerful means of producing contraction of the uterus than a greater degree of cold without the shock.*

“After the second labour, at the beginning of the hæmorrhage, I found the placenta separated, and lying in the vagina; I removed it; the hæmorrhage abated, but a few minutes afterwards it returned as violently as at first; my patient turned white and faint, and said the room was going round with her. I had been talking on the subject with Dr. Rigby, at Norwich, who told me that in hæmorrhage from the uterus, after delivery, he had found La Roux’s remedy the most effectual, and that it had unquestionably enabled him to save several lives, which must otherwise inevitably have been lost. I took several handkerchiefs, soaked them in vinegar, and passed them one after the other into the vagina, so as completely to fill it; this effectually prevented all external hæmorrhage; I no longer felt the blood pouring over my hand; the uterus began to harden; and my patient complained of pain; the colour came into her face again, and her faintness she said was gone. These favourable appearances, however, lasted but a short time; the pains ceased, the uterus grew soft and seemed to swell, the pulse became thread-like and weak, and she turned ghastly pale. It was plain that though I had prevented the blood from escaping externally, it was flowing into the uterus in great quantity, and that I had only converted an external into an internal hæmorrhage. Feeling herself sinking, she screamed out she should never see her children again, and entreated that she might see her husband, and take leave of him before she died. The next instant I thought she had realized her fears; she sunk into the pillow pale and senseless, her face became distorted, and her limbs convulsed.

“My belief now is, that when hæmorrhage occurs after the removal of the placenta, the quickest way to stop it is to introduce the left hand closed within the uterus, apply the right hand open to the outside of the abdomen, and then between the two to compress the part where the placenta was attached, and from which chiefly the blood is flowing. When the hand is introduced merely as a stimulant, there is an inter-

val of time between its arrival within the uterus and the secure contraction of this organ, during which much blood is often lost. By directing the hand to the very vessels from which it issues, and compressing them as I have described, this quantity is saved. If I may judge by my feeling, the blood stops, in a great degree, even before the uterus contracts: the hand acts first as a tourniquet, then as a stimulant. It is true we cannot tell with certainty where the placenta was attached, and consequently where the pressure should be applied; but as it is generally attached to or near the fundus, if the pressure be directed there, it will generally be right. Besides, after the child is born it is often several minutes before the placenta separates and descends; if, during this interval, we pass up the finger along the cord, and observe at its entrance into the uterus whether it turn towards the front, the back, the right or left side, or straight up to the fundus, we shall form a tolerably exact idea of the spot to which the placenta has been attached in this individual case.

“But to return to my patient. As it was my duty no longer to rely on the remedy I was using, I drew out the handkerchiefs and applied my hands as I have described with the most immediate and happy effect; the bleeding stopped, my patient came to herself, and whilst *she* complained of pain, *I* felt the uterus contracting; here was an end of the hæmorrhage and the alarm, and though for many days her face looked bleached, and she almost fainted in the upright posture, she recovered without any untoward circumstance.”

On the Symptoms in Children erroneously attributed to Congestion of the Brain.

The object of this paper is to call the attention of the profession to a disorder of children which has been generally attributed to congestion or inflammation of the brain, but which Dr. Gooch regards as depending upon a state of circulation of a very different nature. In the cases which our author has witnessed, the patients have been from a few months to two or three years old; they have been small and delicate, or else they have been exposed to debilitating causes. The child lies upon the nurse's lap, apparently half asleep; scarcely able to open its eyes, unable or

unwilling to raise the head, and with every appearance of great languor. The skin is cool, and the tongue slightly white. If depletion be employed, the symptoms gradually increase; the languor, deficiency of heat, and weakness of the pulse, becoming more and more marked, till at length the little patient apparently dies exhausted. In two cases, Dr. Gooch has seen, during the last few hours, coma, stertorous breathing, and dilated motionless pupil. The following is a specimen:—

“A little girl, about two years old, small of her age and very delicate, was taken ill with the symptoms which I have above described. She lay dozing, languid, with a cool skin, and a pulse rather weak, but not much quicker than natural. She had no disposition to take nourishment. Her sister having died only a week before of an illness which began exactly in the same way, and which was treated by leeches and purgatives; and some doubts having been entertained by the medical attendant of the propriety of the treatment, leeches were withheld, but the child not being better at the end of two days, the parents, naturally anxious about their only surviving child, consulted another practitioner. The case was immediately decided to be one of cerebral congestion, and three leeches were ordered to be applied to the head. As the nurse was going to apply them, and during the absence of the medical attendants, a friend called in who had been educated for physic, but had never practised it, and who had great influence with the family: he saw the child, said that the doctors were not sufficiently active, and advised the number of the leeches to be doubled. Six, therefore, were applied; they bled copiously; but when the medical attendants assembled in the evening they found the aspect of the case totally altered, and that for the worse: the child was deadly pale, it had scarcely any pulse, its skin was cold, the pupils were dilated and motionless when light was allowed to fall on them, and when a watch was held to its eyes, it seemed not to see; there was no squinting.... The next day she had vomited her food several times; it was, therefore, directed that she should take no other nutriment than a dessert spoonful of ass's milk every hour, and this was strictly obeyed, and continued for several days. The child wasted, her fea-

tures grew sharp, and every now and then she looked fretful, and uttered a faint squeaking cry: the eye-balls became sunk in the socket, like those of a corpse that had been dead a month; the skin continued cool, and often cold, and the pulse weak, tremulous, and sometimes scarcely to be felt. Under this regimen, and in this way, she continued to go on for several days. At times she revived a little, so as to induce those who prescribed this treatment to believe confidently that she would recover, and she clearly regained her sight, for if a watch was held up to her she would follow it with her eyes. She lived longer than I expected; a full week, and then died with the symptoms of exhaustion, not with those of oppressed brain. The head was opened by a surgeon accustomed to anatomical examinations, and nothing was found but a little more serum than is usual in the ventricles."

The inferences drawn by Dr. Gooch are, that the symptoms depended on "a deficiency of nervous energy," that the depletions "ensured the death of the child," and that the state of the eye resulted, not from pressure, but from a deficient circulation in the brain. Another case is related, in which, however, the treatment and the result were both different. Ten minims of spirit ammon. aromat. were given every four hours, and the child put upon an allowance of ass's milk. The improvement was rapid and the recovery complete.

Dr. Gooch justly remarks—

"Two patients complain occasionally of dimness of sight, swimming of the head, singing in the ears; and observe, that if they turn the head on one side, or look at an object, they feel as if they should fall: but the one is plump, florid, and has a full pulse; the other is pale and thin, has cold hands and feet, and a pulse small and feeble. One practitioner bleeds them both; the other bleeds the one, but does what he can to give blood to the other. The latter cures both his patients; the former cures the one, but ruins the health of the other: but such is the nature of the human mind, that the cases *for* a preconceived opinion are retained easier than those *against* it. He remembers his good deed, forgets the other, or calls the case 'anomalous,' and marches on, without the slightest doubt that bleeding is the universal and sovereign

remedy for dimness of sight, swimming of the head, and singing in the ears, save and except only in 'anomalous' cases."

The author alludes to the paper of Dr. M. Hall, lately read at the Medico-Chirurgical Society*, to Dr. Abercrombie's work on the brain, as well as to the interesting experiments of Dr. Seeds and Dr. Kelly, of Leith, on the effect of blood-letting upon the circulation in the brain, as corroborative of his doctrines. We also refer our readers to Mr. North's Treatise on the Convulsions of Children, in which they will find some good observations on the common mistake of attributing all cerebral affections in children to an increased flow of blood to the head.

We need scarcely say that Dr. Gooch does not deny the facts that heaviness of the head and drowsiness, in children, *commonly* depend on congestion, and require depletion: his position merely amounts to this (and it is a very important one in its application to practice), that these symptoms sometimes depend not upon congestion, but on a deficiency of nervous energy, and are to be relieved by "sustaining remedies."

The work before us concludes with a review on the subject of the Plague—one of the best specimens of medical criticism which has ever fallen under our notice, but, of course, unfit for examination in this place.

We have thus laid before our readers a very full account of Dr. Gooch's work, on "some of the most important diseases peculiar to women." The importance we attach to the work is best shewn by the unusual length of the space we have devoted to it. Dr. Gooch, in his letter to us on the subject of a paragraph in the first part of our analysis†, says, "a free press is a vast speaking-trumpet, through which the most insignificant voice is heard far and wide." We are quite aware of the "insignificance" of the voice which, on this occasion, has expressed so favourable an opinion of his work: but as we have the advantage of a trumpet which is blown once a week pretty extensively in these realms, we hope to have added somewhat to the publicity, and therefore to the usefulness of his opinions; while we rejoice to learn that his

* See Medical Gazette, vol. iii. p. 60.

† *Ib.* vol. iv. p. 47.

“broken” health has been “mended,” and that he is ready *practically* to illustrate the doctrines which he so ably enforces in his work.

ANALYSES OF BRITISH MEDICAL JOURNALS.

EDINBURGH MEDICAL AND SURGICAL JOURNAL.

1st July, 1829.

[Concluded from p. 185.]

Art. VII.—*Case of Spina Bifida.* By WILLIAM LAW, Esq. Fellow of the Royal College of Surgeons, Edinburgh.

THE subject of this case was a boy, rather more than two months old when Mr. Law first saw him; and the tumor, of a hemispherical form, two inches in diameter, was in the usual situation on the lower part of the lumbar region. A lancet was pushed into the most prominent part near the middle, and seemed to enter a membranous capsule, distinct from the outer skin; the swelling was more than half emptied of a thin watery fluid mixed with blood, which appeared to flow from the divided edges. Adhesive plaister was put on the opening, and a fold of linen and flannel, with a piece of pasteboard, quilted with tow in a circular form, bound over the part by a roller. After three days the swelling was found of its original size, when the water was again drawn off at a new opening, and the pasteboard reapplied. In three or four days more the same operation was performed, and the surgeon changed the pasteboard for a piece of circular cork. After the first occasion, Mr. L. made the openings more to the side of the tumor, lest he might bring on ulceration, the integument being so thin in the centre as to be almost vesicular; but after a few applications of the cork compress thickening took place at this part.

It was seldom necessary to puncture the tumor after this time, simple tightening of the roller over the compress answering every purpose. The tumor became flat, projecting scarcely 1-4th of an inch from the surface, affording no space for a fluid, which, if any now remained, must have been quite beneath the level of the surface. The child was healthy.

About the third week of October, however, (the operation having been performed the end of September) some increase took place, and the fluid discharged by puncture was thick. At the next opening (on the 24th) it had become purulent. Still, however, the patient seemed unaffected constitutionally, and Mr. Law was much surprised, on the 26th, to be informed of his death, something having been heard to snap about his person, compared in sound to the fracture of a nut.

Exterior to the spinal sheath was a distinct cavity where the pus had lodged; but whether communicating with that canal by a small opening, which was observed, the author cannot, from injury done in clearing out the matter, be quite certain. There was a slight appearance of extravasation beneath the cyst, but no fracture of the ligaments or bones to account for the “snap.”

Mr. Law is inclined to think he ought not to have continued the pressure, when he found pus discharged from the puncture, and if placed in similar circumstances again, would leave nature in this stage more to her own course.

Art. VIII.—*Observations on Sea-Scurvy, as it occurred in the private Ship ——— during a passage from Bombay to England.* By GEORGE KIRK, M.D. Surgeon of the Vessel.

This paper contains no feature of novelty. The crew of a vessel were exposed to various hardships, and had their allowance of food diminished (owing to the provisions of the vessel falling short) at a time when they stood most in need of liberal diet. Many of the crew were attacked with scurvy, and the disease remained unabated by any remedial means till they arrived in port, when a change of diet speedily effected their restoration.

Art. IX.—*Account of an instance of Malformation in some of the Bones of the Skeleton.* By DAVID CRAIGIE, M.D.

On examining the body of a boy two years and four months old, who had died with symptoms of pulmonary congestion, Dr. Craigie was struck with the deformity of the chest.

“On each side, instead of the usual convex swell of the ribs, there was a

remarkable depression extending from the third to the seventh rib inclusive, commencing about two inches from the sternum, and extending in breadth along chest from one and a half to two inches. This depression consisted in each of these ribs presenting a defect of conformation from their posterior convexity to the junctions with the cartilages. At the former point each rib was suddenly bent from its normal curvature to an angular or sharp turn, as if it had been broken, and thence proceeded flat, and in some sense straight, to the cartilage, its union with which was marked by a depression, and a large and evident knob or tuberosity not unlike an articulation. The deformity thus produced was so distinct, that any one would have readily pronounced it the result of a fracture. But to this idea, the circumstance of its extending through so many ribs, and being found with the same uniformity on both sides, formed an objection of some weight. To obtain some light on the matter, I removed several of the ribs, and made one of these longitudinal and transverse sections. By this means the following facts were ascertained.

“The bony portion of the third, fourth, fifth, sixth, and seventh ribs, underwent at the posterior lateral convexity a sudden change of direction, so that the second or straight portion formed with the first or curved a sharp turn sufficient to constitute exactly a right angle. Longitudinal and transverse sections of these ribs showed that no breach of continuity had taken place, and, therefore, that this turn was not the result of fracture. It presented a uniform, firm surface, ash-grey in colour, and traversed, as usual, by minute red lines, yet without manifest trace of interrupted continuity. From this rectangular bend the substance of the bone was of the usual appearance, but looser and more cancellated as it approached the sternal extremity, which was large, soft, and very sectile. It was also forced inward from the cartilage, so as to form the remarkable depression observed on the exterior of the chest, while the cartilage itself projected in the shape of a large round tubercle or eminence. Nothing like false joint was observed either at the point of curvature or at the cartilages.

“These appearances were observed in the third, fourth, fifth, sixth, and seventh ribs; in the four last most dis-

tinctly; in the third and eighth faintly, but still sufficiently well to contribute to the general aspect of deformity on the exterior of the chest. All the ribs were soft and flexible, and spongy and sectile; and I cannot convey the idea of this condition more distinctly than by simply stating the fact, that in removing several of the ribs and making sections, I did not use the saw, but simply cut them both transversely and longitudinally. As has been already stated, they were in all respects the same on both sides of the chest.”

The bones of the cranium were deficient in ossification, the fontanelle being incomplete for two inches, and no union had taken place at the sutures, the place of which were supported by fibro-ligamentous structure. The foramen ovale of the heart was inclosed, and there were several invaginations of the intestines. Dr. Craigie, on referring to various standard anatomical writers, has not been able to find any instance of the same kind of malformation of the chest on record. Might not some of the modifications of exercise recommended by Mr. Coulson in his interesting paper (see Gazette, vol. iv. p. 69) have been of service?

Art. X.—*Case proving the Existence of a Cuticular Covering over the Human Cornea.* By ROBERT SPITTAL, Esq.

Mr. Spittal's object is to prove that there passes over the cornea a continuation of the cuticle which covers the body generally. That such is the case we believe is accordant with the opinion of most anatomists, though the idea has been derived from analogical reasoning rather than from demonstration. This last evidence is afforded by the following case:—

“A. F. a young man, aged 21, received a severe blow when eight years old, with a stick, on the left temple, which caused fracture of the upper and outer side of the orbit, without wounding the integuments. Considerable inflammation of the fractured and contused parts ensued; abscesses formed between the fractured portion of orbit and eyeball. These burst externally, and continued to discharge for a considerable time; but as that process ceased, and the parts began to cicatrize, the eyelids became retracted and everted, particularly the upper, so that they

gradually became unable to perform their proper functions, and in consequence the eye was left constantly exposed to the air.

“The effect was to be anticipated. The surface of the eyeball lost its lustre, gradually became dry and dim, and vision became impaired. The parts completely cicatrized, and the dimness of vision gradually increased for several years, so that he could only distinguish very bright objects.

“Such, then, is a sketch of the history of the case; and I shall now describe the appearance of the eye as it was about a year ago, when I first saw the man.

“On drawing the finger along the orbit, the portion which had been fractured was quite evident, together with the cicatrix mentioned. The upper eyelid was so much everted, that its inner surface, and nearly the whole of the anterior part of the eyeball, were exposed, protected only by a most distinct cuticular covering, through which the iris and pupil were very indistinctly seen. The cuticle was continuous with that covering the inner surface of the eyelids, passed completely over the surface of the eye, and was not bound down in any way at the line of junction between the cornea and sclerotic coat, but was evidently quite continuous over the whole surface, from the corrugations noticed on the motion of the eyeball; and, indeed, with the finger it could be made to move slightly over the subjacent parts. The cuticle was fully more distinct than that on the external parts of the lips, and its opacity alone caused the impaired vision.”

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Art. XI.—*Observations on the Bark of the Root of the Calotropis Mudarii.*
By ANDREW DUNCAN, F. R. S. E.,
Professor of Materia Medica in the
University of Edinburgh. To which
are subjoined “Observations on the
Bark of the Calotropis Gigantea of
the West Indies.” By ——— LYON,
Esq. Staff-Surgeon.

After some account of the botanical history of the plant, and also of its chemical composition, which last is taken from the experiments of Dr. Adam (we believe of Calcutta), Dr. Duncan proceeds to state the result of his observations on its powers as a medicinal agent. Its action is so similar

to that of ipecacuanha that the Doctor thinks it might be adopted as a substitute for it. His first trials with it were in cutaneous diseases, and the results led him to entertain a favourable opinion of it, especially in psoriasis and lepra. The following case is quoted as an illustration:—

‘Catherine Townly, servant, æt. 17, 30th November. There is a scaly eruption of different degrees of intensity, situated on the forehead, temples, scalp, fore-arms, and knees.

On the forehead and temples it consists of circular spots, varying in size from a minute speck to nearly an inch in diameter; the smaller being merely elevations of the cuticle, red, glossy, and round, and the larger covered with whitish scales. The entire scalp, particularly towards the vertex, is coated with thick prominent circular crusts, composed of collections of dry scales.

On the upper and back part of the left fore-arm there is a large triangular patch about four inches in length, the base extending from the olecranon to the outer condyle of the humerus, the apex pointing on the shaft of the ulna. Its surface is partly scaly, but red and hardened where scales have been detached; it is intersected by transverse fissures, and its outline is formed by the segments of several circles which have spread into each other. Between this and the radius there is a similar patch of smaller size. Above the wrist there are two remarkable spots, the larger an inch in diameter, red, shining, scaly, and having an elevated regular edge. On the right arm, both knees, on the left leg, and outer side of right thigh, the disease exists with the same characters, but to less extent. There is one spot also on the left upper arm, and another on the back of the neck. In all places it is constantly itchy, but free from pain on pressure or increased heat. A bloody serous fluid is occasionally discharged from the different fissures, and at present from an abraded surface on the right knee. The disease is imputed to exposure to changes of temperature in a heated kitchen, and first appeared eight months ago nearly at the same time on the face, scalp, arms, and knees, in the form of small red spots, which gradually became larger and scaly. In June she was admitted into the country ward, and treated principally with baths,

dulcamara and pitch applications, under which the eruption faded from the face, and the large spots desquamated from the centre, leaving a large marginal ring; but the affection of the scalp increasing obstinately, she was dismissed in six weeks. A fortnight after dismissal the spots on the face returned, and the disease gradually assumed its present appearance. One of her sisters has been similarly affected for four years. Functions are all natural, and the skin in other situations soft and moist.'

"She was directed to have a tepid bath every second evening, and to take three grains of mudar powder three times a-day. Next day the dose was increased to five grains three times a-day. After the first bath the desquamation began to increase considerably. On the third the leprous spots were reported to be sore and cracking. On the fourth she began to have nausea from the use of mudar, which was afterwards kept up in a greater or less degree. She now also sweated much after the baths.

On the 6th her hair was cut out, and the eruption on the head was then observed to consist of round distinct crusts, the larger about half an inch in diameter. On the face the eruption was desquamating, but on the other parts of the body it was disposed to crack, and was very itchy. She had also some febrile symptoms. Her pulse was sharp and frequent, and her tongue furred and tremulous. Sixteen ounces of blood, quite healthy in appearance, were drawn from the arm, and the eruption on the head was directed to be rubbed with linim. aq. calcis, which she applied also to other parts of her body, as she felt benefit from it.

On the 7th the mudar was directed to be increased to seven grains for each dose. The nausea, which had declined, was renewed, the sweating increased, the eruption continued itchy, but the skin was less red where the scales had fallen off.

On the 12th she was directed to take seven grains four times a-day: under this increased dose the improvement was progressive.

On the 19th the mudar caused vomiting. The dose was diminished to five grains.

On the 20th, with the view of increasing its diaphoretic effect, and to check

its tendency to produce vomiting, I suspended the simple mudar powder. I prescribed a scruple with a grain of opium, to be divided into three doses, to be taken during the day; but each dose produced vomiting.

On the 22d I combined nine grains with one of opium, and gave it as before, but still vomiting was excited.

On the 23d the simple powder was resumed, which he did not vomit. On the 25th it was combined with lupuline; but this also disagreed, and from this time the simple powder alone was given internally, along with the tepid bath and the linim. aq. calcis externally. Under this treatment the amendment was rapid, and on the 19th January, 1829, she was dismissed with very little traces of lepra, either on the head or body, while no appearance of fresh eruption had taken place for a considerable time past. She had not been so well since the first appearance of the disease."

The mudar appears to produce full vomiting in doses of 15 or 20 grains. In smaller doses, as from 3 to 7, it keeps up more or less nausea, with diaphoresis, in which manner it is found most efficient in cutaneous affections. In still smaller quantity it acts as an expectorant, or as a tonic and stomachic. Dr. Duncan has not known it operate as a purgative.

It yields a principle similar to emetine—which he calls *mudarine*—and which, in small doses of from one to three grains, produces vomiting.

The *Calotropis gigantea* appears by a letter from Mr. Lyon to Dr. Duncan to possess properties very similar to those above mentioned.

The author of the paper states in conclusion that he will be happy to furnish any gentleman with some of the mudar powder who may wish to try it.

Art. XII.—*Case of Acute Watery Effusion in the Brain taking place without Inflammation.* By WILLIAM SHEARMAN, M.D. London.

Dr. Shearman, in his Essay on Water in the Brain, published some years ago, endeavoured to controvert the idea that hydrocephalus was a distinct and specific disease, dependent on inflammation. On the present occasion he relates a case which he is of opinion strongly supports his doctrine. We subjoin it, premising, however, that as we look

upon calomel as one of the most powerful anti-inflammatory remedies we possess, so we cannot admit a case in which a child of three years of age takes twelve grains of calomel in less than three days, as one treated without means calculated to remove inflammation.

“Richard Milsom, aged 3 years, of a weakly constitution, and of a scrofulous appearance, was brought, Nov. 6th, to the West London Infirmary, with symptoms of hydrocephalus. His head was constantly in rolling motion, accompanied with convulsive twitchings in his limbs. His countenance had an idiotic expression; and he was incapable of recognizing his mother or surrounding objects. The pupils of the eyes were greatly dilated; and the child appeared unable to see, a near approach of the hand of a bystander to the eyes not producing any motion of the eyelids. The pupils, however, slightly contracted on the approach of the light of a candle, but not otherwise. The bowels were rather constipated, but there was neither hardness nor tension of the belly; pulse nearer natural. He had not spoken for many days. The account given by his mother was, that he was attacked a fortnight previously with febrile symptoms, accompanied by purging. These continued for a week, at the end of which time she discovered in the morning that the child was unconscious of her presence, and incapable of seeing, and exhibited all the other symptoms now present.

Aplicetur abdominis lateri dextro Empl.
Cantharidis. Sumat statim pulverem
aperientem ex Hydrarg. Submur. gr. i.
2 quaq. horâ.

Nov. 9th.—Blister had drawn and discharged freely. Twelve of the powders had been taken, but at rather longer intervals than prescribed. Bowels well open; urine copious. The child is now conscious of his mother's presence, and of surrounding objects, and can see perfectly well. The rolling motion of the head and the convulsive twitchings have ceased. He was ordered ten drops of diluted sulphuric acid, and of vinegar of squills, every four hours; and four grains of rhubarb and of magnesia, with one of calomel, every night.

13th.—The child is still improving.

Contin. Medicam.

20th.—No symptoms remain. The

medicines were ordered to be continued for a short time, with the addition to each of the powders at night of 3 grains of Ferrum Tartarisatum.”

Art. XIII.—*Superior Maxillary Bone Excised.* By JAMES SYME, Esq.

This paper consists of a letter addressed by Mr. Syme to one of the editors, in which he adverts to the difficulty of removing osteo-sarcoma of the upper jaw, in consequence of which it has generally proved fatal. He then proceeds:

“Attempts have accordingly been made to accomplish this amputation of the superior maxilla, but have hitherto failed, chiefly owing to the uncontrollable hæmorrhage which, I have heard, obliged one operator to desist even after he had tied both carotids. A case lately occurred in which I overcame this difficulty; and as the plan of operation followed on the occasion in question seems to me such as renders the process very easy and safe, I think the readers of your Journal may consider it deserving of their attention.

William M'Donald, æt. 54, recommended by my friend Mr. Davidson of Dundee, entered the Surgical Hospital on the 11th of May, on account of a large swelling of the left cheek. The tumor was about the size of a turkey's egg, firm, projecting, and circumscribed. It seemed to occupy all the maxillary bone, extending into the mouth, but not passing beyond the mesial plane of the palate, and reaching up to the lower edge of the orbit. It had existed ten months, and was rapidly increasing. In these circumstances Dr. Ballingal and Mr. Nasmyth agreed with me in thinking that the patient's speedy destruction was inevitable if the disease were left to itself; that an attempt to dig out the tumor would be inflicting pain without the smallest prospect of permanent benefit; and that the case was a very fair one for practising excision of the entire superior maxillary bone.

In the presence of the gentlemen above-mentioned, and the pupils attending the hospital, I proceeded to do so on Friday the 15th.

The patient being seated on a chair, I made a crucial incision by cutting from the zygoma to the angle of the mouth, and from the inner angle of the eye to the angle of the jaw. Having

dissected back the flaps thus formed, so as to bring the external surface of the tumor completely into view, and tied the facial artery, together with two transverse facial branches of the temporal, I partially divided the malar bone with a saw, and completed its section by means of the cutting piers. I then, partly by dissection, and partly by pushing with the handle of the knife, separated the contents of the orbit from the floor of that cavity; next, placing one blade of the cutting-piers in the nose, the other in the orbit, divided the nasal process of the maxillary bone, and cut through the hard palate in a similar way, having previously extracted one of the incisor teeth.

So far I had calculated that the operation would be nearly bloodless; but to prevent troublesome hæmorrhage in executing what remained, it seemed to me proper to get command of the internal maxillary artery. In order to do this, I made a small incision below the ear, and dissected through the parotid gland, so as to enable Dr. Ballingal to compress the vessel between the point of his finger and the neck of the lower jaw. I then readily and fearlessly turned out the tumor, and we were pleased to see that the artery was as effectually subjected as the femoral ever is by the best applied tourniquet. We were less pleased to observe that the morbid growth was not confined to the maxillary bone, but extended to the sphenoid, in the base of the skull.

Having done all that we proposed, and all that could be done, we determined to try nothing more. I therefore brought the edges of the cheek together by sutures, and sent the patient to bed. The blood lost was measured, and found to be ten ounces.

The patient suffered no constitutional disturbance, and was walking in the garden on the third day after the operation.

Though there is still no appearance of the disease recurring, there can be little doubt that the result will be no exception to the usual one of such cases; but knowledge of the facts that the inferior maxillary bone may be completely excised—and that the hæmorrhage of internal maxillary artery may be effectually restrained by pressing the vessel at its origin upon the neck of the jaw—may be useful in future, by inducing surgeons to practice excision while the

disease remains within accessible limits."

The result of the case is promised on a future occasion.

MEDICAL GAZETTE.

Saturday, July 18, 1829.

"Licet omnibus, licet etiam mihi, dignitatem *Artis Medicæ* tueri; potestas modo veniendi in publicum sit, dicendi periculum non recuso."—CICERO.

HUMAN SLAUGHTER-HOUSES AND PROFESSIONAL BUTCHERS.

WE have for a long period abstained from noticing our hebdomadal cotemporary, for reasons which must be obvious to all professional men in and near the metropolis; and which must soon become apparent even to those provincial readers who continue to take in the *Lancet*—or rather whom the *Lancet* continues to take in. That once notorious vehicle of detraction is now becoming as obscure as it is destitute of professional information, and of all the qualities which can give respectability to a scientific or literary publication: even its Editor, with all his matchless effrontery, has long been too much crest-fallen to vapour about the circulation of his journal, and though he may retain the disposition, he has happily lost the power, to degrade the character of the profession. Still, enough of the old leaven remains to require occasional castigation, and as our long forbearance has lulled him into security, he has again begun to put forth his venom, in general calumnies and dark insinuations. Our public charities are once more held up as "human slaughter-houses," and those who devote their time and talents to the relief of the poor as butchers "only remarkable for their ignorance, impudence, and cunning." As we have already said, to those resident in London any exposure of Wakley's editorial propensities would be a work of supe-

rerogation ; but to those at a distance a few words may be proper, to check the influence of his reviving malignity.

The reputation which the *Lancet* once possessed was founded partly upon a basis of quackery and false pretension, and partly upon the adventitious support of two or three able members of the profession, who, we regret to say, contributed in this way to uphold a system of delusion. This support has long been withdrawn ; and nothing but the quackery and false pretensions remain. Even the country customers of the *Lancet* must begin to entertain misgivings of the capacity of Thomas Wakley to sit in judgment on the scientific attainments of all the most distinguished men in our profession, and to look for some better evidence of his experience and skill than is to be found in his own ridiculous claims to superiority. Nay, the most confiding of our provincial brethren must, we apprehend, occasionally marvel how it happened that a man should suddenly become qualified to criticise medical treatment and surgical operations, of whose practice no instance was ever made public—excepting only in describing the events of that dreadful night when his house was set on fire by an incendiary ; and with regard to surgery, who was never accused of having performed any operation saving that of decapitating Thistlewood the traitor. That he had been charged even with this exploit in chirography we should not have known, nor probably would any one else, but for the declaration of Mr. Wakley himself, under circumstances to which it is unnecessary at present to allude. True it is, that when first he drew public attention to this accusation, he modestly denied the “soft impeachment” ; but, should his friends attribute the negation to the excess of his diffidence, and give him the credit of this patriotic

performance, still cutting off the head of a traitor must, we apprehend, appear, even to his country patrons, an indifferent preparation for cutting up the heads of the profession.

But although there may be no living evidence of his achievements in the capacity of a surgical operator, all his country readers have the authority of his own wrapper for believing that he is, at any rate, a powerful writer and a wit of the first water. The *Times*, in a luckless hour, gave insertion to a puff of the *Lancet*, and although that journal, on a subsequent occasion, infinitely more than neutralized its injudicious commendation, still is the “*TIMES*” cited week after week, month after month, and year after year, as an eternal voucher to the scientific attainments of this learned Theban.

The *Times*, however, spoke to the churchwarden’s science alone ; but that there might be as little doubt of his wit and humour, these are certified by a publication of no less weight and authority than—the *VERULAM* ! By the *Verulam*—read, and wonder as ye read, oh ye wise ones who patronize the *Lancet* !—Wakley is declared to hold the same rank as a writer in the medical world as the *Edinburgh Reviewers* do in the republic of literature,—and who shall gainsay what the *Verulam* has declared ? True, the *Verulam* is—or rather *was*—a publication that expired in the third week of its existence ; but, no matter, it inserted a puff of the *Lancet*, and the editor hopes it may go down with country readers as a high authority.

But to come to the more particular object of our thus again trespassing upon our readers by any reference to the *Lancet*. There is in the last number of that publication an article in which several excellencies of the editor are so happily blended,—viz. truth, moral feeling, and wit,—that

we cannot resist the temptation of making a few extracts from it. It is not fair that the enjoyment of so much dignity in sentiment and liveliness in composition should be entirely confined to our provincial friends : London readers, also, should have an opportunity of appreciating the material to the merit of which the Times, Verulam, and Cobbett, are made to bear weekly testimony.

The article in question is one of a series in which the amiable editor assures the public that (if they will take his word for it) our hospitals, infirmaries, and dispensaries—in short, all the charitable institutions in the kingdom in which the public have hitherto been weak enough to suppose that relief is afforded to suffering humanity—are in fact slaughter-houses, wherein the sick poor are systematically butchered by a set of designing knaves, who, while they monopolize medical practice, and leave the great body of the profession without patients, are at the same time wholly ignorant of medicine and surgery ;—and infinitely less capable, with all their experience, of practising their art with success, than those who, by reason of this shameful monopoly, have had no opportunity of practising at all ! Hospitals, according to the dictum of this eminent authority, are the *principal* human slaughter-houses, while dispensaries and infirmaries are the *minor* ones. “ The public and the profession (says Wakley) are at last awakened to a sense of their duty, and perceive, as we knew they soon would, the baneful influence of those minor slaughter-houses—infirmaries and dispensaries.” And again, “ thousands of persons are annually butchered among the miserable in and out patients of these *charitable* institutions.” The key to all this incredible trash is briefly this : the Editor of the Lancet finds himself scouted by the profession as a person unfit, both in point of knowledge and good faith, to criticise the practice

of hospital physicians and surgeons ; hence his hostility to these institutions, and to their office-bearers. Farther, the above-mentioned respectable person, judging from his own standard of morality, believes that he will gain the ear of the public by pretended disclosures of atrocities practised upon the objects of their benevolence ; and, more especially, that he will obtain the favor of general practitioners by appealing to their pecuniary interests, and representing them as sufferers by the extension of medical charities. Hence the war he has just declared against dispensaries ; hence the recent attempts to add to the list of his victims dispensary surgeons.

So much for the public spirit which has called forth Wakley’s denunciation of all charitable institutions for the relief of the sick poor. But then the wit and humour commemorated by the quondam Verulam ; let us turn to them for relief ; let us forget that the disgusting banquet is derived from the “ human slaughter-house,” and dwell only on the attic salt with which it is flavoured.

It seems that among the inhabitants of Camberwell, who signed a requisition for a meeting to consider the propriety of establishing a dispensary in that village, there were two gentlemen named Bean. Now, it is the custom, as every body knows, to eat bacon with beans ; and this custom affords the rival of the writers in the Edinburgh Review an opportunity of indulging in the following exquisite vein of humour :—

“ The object of the meeting was supported by only two persons connected with the medical profession, and whether they be Dubs, or of the Rhubarb Hall Company, we know not ; but, certainly, the names of Edward Bean, and Edward Fowler Bean, do not appear in the list of members of the Royal College of Surgeons. Notwithstanding this omission, they may be, and are, for aught we know to the contrary, very

respectable individuals. That they have some ingenuity, there can be no doubt; and this is the season of the year when the energies of Beans are characterized by more than usual activity. In fact, this is the season when they are thrust before the faces of all classes of the community, to the great aversion of many, it must be confessed, and, indeed, to the distaste of all, unless accompanied by certain spices and garnishes, but more especially with an article of Jewish abhorrence, strongly eulogised by Mr. Cobbett in his *Cottage Economy*. Now, although the soil of Camberwell is rich and deep, it appears to be incapable of imparting to the vegetable we have just named, a finer flavour, or a more agreeable verdure than it acquires elsewhere. In a word, the Beans of Camberwell, like all other beans, appear to be valueless without the swinish accompaniment. The Beans of Camberwell are aware of this unpleasant fact; and, in order to render themselves more sightly and palatable to their purchasers and neighbours, are very desirous of being united with a fine junk of fat BACON, misnamed a *dispensary*."

Such is the miserable trash which this writer imagines to be wit, and which he would no doubt be ready to puff as better than the finest strokes in RABELAIS or SWIFT, if the language* of the one and the meaning of both were explained to him.

But if the lucubrations of the *Lancet* consisted merely of such harmless drivelling as that we have just quoted, they should not receive even a passing notice in our pages:—it is the *morality* which characterizes the publication—it is the unprincipled attempt to sow distrust in the minds both of those who support, and of those who are supported by our numerous charities,—which renders it our duty to hold it up from time to time to public scrutiny and public scorn. When we see deep and damning charges, not directly made, so as to admit of refutation, but darkly insinuated, so as to inflict the injury and yet es-

cape the punishment, we shall always be ready to denounce the cowardly traducer, of whom it may truly be said,

"Like the Fell One, he works at his damnable
woof,
And blights a fair fame without hinting at proof."

The following quotation will justify these remarks:—

"The manner in which the poor are treated by some of these charity-mongers is truly horrible. We know of one fellow who contrived, some time back, to get himself elected to a large dispensary, although, up to the period of his election, he had not performed a single surgical operation, worthy of being called an operation—who knew no more of medicine than the desk on which we are now writing—the extent of whose charity and benevolence may be appreciated by the fact, that he openly contends for "the propriety of a man's cutting the throats of his newly-born infants if he consider that he has too many children, and has not a fair prospect of maintaining them;" and who once, for the "*sake of charity*," treated a blind woman, with ulcerated legs, in a way which we will not now state. This is a pretty fellow to hold an important office in a charitable institution. But the subscribers to his *charity* and the public shall know more of the monster before we have done with him. Such a man must be a truly kind and humane attendant on the poor."

We at first doubted whether this charge, the extravagance of which contains its own refutation, was directed against any particular dispensary or any particular individual, and the character of the Editor of the *Lancet* renders it possible enough that it is a *sham* attack, like the *sham* reports in his journal, or the *sham* public meeting, or the *sham* public dinner, or the *sham* subscription for paying his law expenses. But if the slander be really aimed at some surgeon, whom Wakley is desirous of injuring by these horrible insinuations, the attack may be founded either upon his own estimate of the individual's professional character, or upon opinions retailed to him at second hand. If the former supposition

* For an amusing specimen of translation, see page 223 of the present Number.

be true, it will suffice to ask who is he,—the man who thus erects himself into a judge of the competency or incompetency of any member of the profession? One of whose professional experience no evidence has ever found its way to the public, except the statement concerning the single patient above alluded to. That statement was made in the course of the action successfully brought by Wakley against the Hope Insurance Company, to recover a sum of money which that Company refused to pay, on the alleged ground of the plaintiff having committed the crime of arson, and it is material, for the sake of all surgeons whose reputation Wakley may attempt to destroy, to direct especial attention to this action, because the details brought to light such particulars with regard to his practice as clearly shew that he had no means of acquiring such a critical knowledge of his art as could qualify him, either by his commendations or his anathemata, to give or to withhold any professional reputation. With regard to the second supposition, viz. that he is now attempting to destroy the reputation of another surgeon on hearsay evidence—we have but this to say;—an innocent man, who has felt the bitterness of unmerited suspicion, and who must reflect with anguish on having himself been the victim of an unfounded imputation, which put his character, and even his life in jeopardy—ought not *he* of all men to be tender of the reputation of others?

EXTRACTS FROM JOURNALS,

Foreign and Domestic.

FATAL MISTAKE IN A PRESCRIPTION.

WHEN we consider the hurried manner in which medical men often write their prescriptions, it appears wonderful that so few mistakes should occur; nevertheless the following case will show the necessity of caution, and the propriety of the physician *invariably* reading over his prescription with care before he sends it to the chemist. Dr. B. of Mon-

tague states that he was consulted about a child on the 26th of May, for whom he recommended ten grains of sulphate of quina in a lavement. In writing his prescription, however, he inadvertently substituted the word MORPHINE for *Quinine*. The injection was administered, and the child died in a few hours! It is creditable to Dr. B. to give publicity to the fact, as a warning to others; and the manner in which he expresses himself shews the indelible impression which the event has made upon his mind.

ON THE BRAIN, AS AN AGGREGATION OF PARTS.

Dr. Spurzheim contends that the human brain should be viewed, not as a single organ, but as an aggregate of many different nervous apparatuses, each destined to the performance of a special function. What the peculiar function is, which each of the cerebral organs performs, cannot, indeed, be at all inferred from its anatomical structure, but must be gathered from other evidence. In comparing the brains of different animals, this process must be reversed; and whenever we find organs performing the same functions in different animals we must conclude that they are in reality the same organs, however they may differ in their size, structure, appearance, or situation. The brains of animals belonging to the same class resemble each other in their general type, although the several apparatuses appropriated to each function may vary in their size and numbers. The author next attempts to establish the proposition, that the parts of the healthy human brain are essentially the same, although somewhat modified in their size and quality in different individuals. In support of this doctrine, he endeavours to show, that the several convolutions on the surface of the cerebrum may be identified in different brains; and that this identity may be recognized in the two lateral halves of the same brain. On examining the brains of some idiots, he found that certain convolutions, which he believes to be capable of being thus identified, are defective, and others entirely wanting. He makes a similar observation on the brain of an ourang-outang, which exhibits a closer analogy to the human structure than that of any other mammiferous animal, and in which he could not discover some of the convolutions which exist in the brain of an idiot,

from a preparation in the possession of Mr. Stanley, and of that of an ourang-outang belonging to Dr. Leach, now deposited in the museum of the College of Surgeons.—*Philosophical Magazine*.

OBSERVATIONS ON THE INFLUENCE OF COLD ON NEW-BORN CHILDREN.

Dr. Trevisan has been making researches in Italy, principally at Castel-Franco, analogous to those of MM. Villermé and Milne Edwards in France. The conclusions at which he arrives, are:—1. In Italy, of 100 infants born in December, January, and February, 66 died in the first month, 15 in the course of the year, and 19 survived;—2. Of 100 born in spring, 48 survive the first year;—3. Of 100 born in summer, 83 survive the first year;—4. Of 100 born in autumn, 58 survive the first twelve months. He attributes this mortality of the infants solely to the practice of exposing them to cold air a few days after their birth, for the purpose of having them baptised at the church. As well as MM. Milne Edwards and Villermé, Dr. Trevisan calls the attention of the ecclesiastical authority to measures suited to put a stop to such disasters without violating the precepts or practices of religion.—*Brande's Jour.*

HEIGHT OF THE PATAGONIANS.

An officer of Captain King's expedition communicated to us the following interesting notice:—

Measurement of the largest Patagonian in a Tribe of about 150 in number.

	Feet. Inches.	
Height.. .. .	6	2
Circumference of the chest ...	3	11
Do. of the loins	3	5
Do. of the pelvis.....	3	10

The limbs in this man were finely formed; but the muscles were not so strongly marked, and did not exhibit those elevations, when thrown into action, so much as in stout sailors, or other athletic Europeans, who have been accustomed to muscular exertion. There was seemingly, in the whole of them, of both sexes, a thickish layer of adipose substance under the common integuments, covering the whole of the body, which seemed to fill up the hollows of the muscles, seen so distinctly in most hard-working persons. The shortest man in their party was five feet ten inches and a half high; the generality of them appeared to be about six feet, with large bodies. The

women, I thought, were larger in proportion to the men than is observed in civilized society.—*Jameson's Journal*.

HOSPITAL REPORTS.

HOTEL DIEU.

*Conclusion of the Case in which M. Dupuytren tied the Subclavian Artery on the Distal side of an Aneurism.**

WE brought this case down to the 15th of June in our former report, being the third day after the operation. At the time our last number went to press, we had only received the "Lancette;" and as the account it contained was very meagre and unsatisfactory, we delayed publishing any report till other French Journals arrived: from these we now subjoin the following particulars:—

The tumor, as we have said, had sensibly diminished in volume, but the pulsations continued as strong and as superficial as before. The same treatment was continued; that is to say, compresses dipped in a weak solution of sugar of lead were applied to the swelling, and over this was placed a bladder, filled with pounded ice. Internally, the same rigorous diet was adopted, and anti-spasmodic draughts were administered, along with some acetate of lead.

17th.—Up to this date no accident had occurred; the limb retaining its natural heat and colour. To-day the patient appeared rather agitated; the tumor had been very much disturbed by some violent fits of coughing, and the pulse became quick and frequent. He was now bled from the arm, by direction of M. Dupuytren. About mid-day it was observed that the compresses covering the wound had become tinged with florid blood. The dressings were removed, but the source of the hæmorrhage was not discovered: the wound was then washed with cold water. The flow of blood ceased, and he was again bled in the arm; after which he had a tolerable night. The quantity of blood lost from the wound was estimated at not more than five or six ounces, but the patient was very much weakened. M. Dupuytren was of opinion that the hæmorrhage might have proceeded from a rupture of that

* We stated last week that the patient died on the twelfth day after the operation; this was wrong; death took place on the morning of the ninth day.

part of the aneurismal tumor which was situated beneath the clavicle.

18th.—The wound was dressed; it looked well; there was no hemorrhage; a small bleeding from the arm was practised.

19th.—The bottom of the wound appeared swollen, as if the aneurismal tumor had made progress in that direction. Another bleeding, to the extent of one porringer, was had recourse to. The pulsations in the tumor above the clavicle continued the same, so that up to this time the operation had produced no therapeutic effect beyond that of lessening the size of the tumor.

20th.—During the morning he continued in the same state as yesterday, the arm retaining its temperature; the numbness remained as before.

In the course of the day the patient felt himself very weak. Towards evening he experienced general uneasiness; repeated fits of syncope came on, and, without presenting any other symptom, he expired at 4 o'clock on the morning of the 21st. A small bleeding, conditionally ordered by M. Dupuytren, was not practised. It is stated that during the progress of his disease, altogether, before and after the operation, thirteen or fourteen venesections were employed; six of these were during the last eight days.

Dissection.—The right arm (being that of the side operated on) presented a livid and gorged appearance; numerous livid veins were perceptible, and the cuticle was raised at various points. The pupil of the ward, who had scarcely ever quitted him during his illness, affirmed that the arm underwent no particular change, and that the colour and temperature remained the same to the last.

Nothing worthy of remark was found in the head or abdomen.

Thorax.—The first and second ribs on which the tumor rested were absorbed, and at one point entirely destroyed; the right and left cavities contained six or eight ounces of sero-sanguineous effusion, of deep colour; the heart was flaccid and empty; it was very large, the parietes being attenuated rather than hypertrophied; the pleura investing the back part of the right lung was inflamed; false membranes of considerable thickness appeared on its surface; the lung of that side presented

numerous points of hepatization; the aorta, from its origin till three fingers' breadths from its passage through the diaphragm, was enormously dilated, in such a manner as to be capable, at various points, of admitting the fist of a child of ten years old; its walls were remarkably thick; its internal surface of a livid red, having, at numerous spots, fungous growths, erosions, and asperities, proceeding from very hard ossifications. This great change in the structure of the aorta ended suddenly at the ventricle.

The subclavian was diseased from its commencement to its termination. The tumor formed by it extended beneath the clavicle, passing behind the axillary artery, which at this point was flattened; backwards it reached as far as the superior spinous fossa. Notwithstanding it had undergone a perceptible diminution since the application of the ligature, both in this and the other directions in which it had extended during life, no perforation was discovered in it.

The aneurismal tumor contained but few clots, except in front, where the greatest dilatation existed; here there were numerous depositions in thin layers; there were also some at the bottom, but not so many. No trace of the arterial parietes could be discovered beyond the interval of the scaleni muscles; beneath the clavicle the three tunics of the vessel could be traced, and presented the alteration above described as existing in the aorta, viz. an appearance of fungous irregularities. The constriction exercised by the thread, which consisted of silk, did not appear to be very great. In one point of the circumference of the artery a small opening was found, which was attributed to the pulling of the ligature during the dissection of the tumor. The inner membrane was cut in some places, but not in others. *There was no trace of coagulum*, and the whiteness of the inner membrane showed that no inflammatory action had taken place in it; the vessel was sound throughout the rest of the limb. The axillary vein at the situation of the ligature was black, fungous, and softened, and torn with the greatest ease. Numerous large branches (query, arteries or veins?) which arose at this place were blocked up by clots of a grey colour.—*See La Clinique, Journal Hebdomadaire, and Lancette Francaise.*

Ingenious mode of making a Case correspond with a trifling Mistake in translating it.

We have been very much amused by the account given of the above case in the *Lancet*: instead of corresponding in any degree with our report, it is therein roundly stated that the patient died "in consequence of hemorrhage." This, we are told, broke out on the 17th; but, instead of adding that the bleeding stopped at once on the application of cold to the wound, it is expressly stated "that the patient was bled a second time, and, as the discharge of blood continued, a third time." On the 18th, according to the *Lancet*, the bleeding from the wound still persisted, being estimated at "about six ounces daily;" and again "on the 19th hemorrhage still continued." On referring to the *Lancette Française*, from which Wakley's version of the story purports to be taken, we found not a word of all this, and were for some time completely at a loss for an explanation. At length, however, the enigma was solved. We perceived the words in French to be, "*environ six onces de sang se firent jour par la plaie*," which the *Lancet* happily renders "HEMORRHAGE, THE AMOUNT OF WHICH WAS ABOUT SIX OUNCES DAILY." The French journalist uses this expression in speaking of the whole quantity lost on the 17th, and says not a syllable about its return; but then, as six ounces "*se firent jour par la plaie*," the worthy Editor thought the interpolation of a few reports under corresponding dates, specifying the continuance of the hæmorrhage, would render his account more complete: as to its truth and accuracy, that, with some people, is always but a very secondary consideration.

From this specimen our readers may judge of the degree of confidence to which the "Foreign Department" of our cotemporary is entitled.

ST. GEORGE'S HOSPITAL.

Diabetes Mellitus—Employment of Opium—Rapidly fatal Sore Throat—Dissection.

RICHARD ROCKALL, a lad from the country, eighteen years of age, was admitted into hospital, on the 20th of May last, under the care of Dr. Seymour, labouring under diabetes mellitus. He voided upwards of seven pints of saccharine urine in the 24 hours*.

* This was his account, but probably he underrated the amount.

The body was lean, the features pinched, the skin generally coarse, and the superficial, capillaries injected; tongue whitish and moist; bowels rather costive; pulse low and weak; sense of debility, and lassitude extreme. He had no cough nor hectic, inspired well and without pain, and had no uneasiness on pressing the belly or the lumbar regions.

He had always enjoyed good health till about ten weeks before his admission, from which time he dated the commencement of his malady, and attributed it to drinking cold water when in a state of profuse perspiration. He had never suffered any pain, but the feeling of weakness and quantity of urine had been gradually increasing during that period. He had lived as far as possible on animal food, by the direction of the surgeon who saw him in the country.

Dr. Seymour prescribed an opiate draught to be taken at night, and on the 21st ordered in addition a two-grain opium pill every evening, with the full diet of the house. On the 23d and 24th fifteen pints of urine were made in the course of each twenty-four hours, and on the latter day the dose of opium was augmented to two grains morning and evening, with eight ounces of meat for dinner and supper, milk for breakfast, and two ounces of lime water three times daily.

25th.—Ten pints and a half of water made in last twenty-four hours.

26th.—Only six pints and a half of urine; pulse 84; skin dry; bowels open; opium does not make him particularly drowsy.

Rep. Opii gr. ij. ter die et alia.

29th.—Quantity of urine raised again to eight pints. The opium makes him very sleepy, and he has sweated much at nights of late, but he thinks notwithstanding that he gains strength. The quantity of opium was augmented yesterday to two grains four times daily.

31st.—Eight pints and a half; appetite not so ravenous as it was, but he steals the bread from the other patients.

Augeatur dos. Op. ad gr. iij. ter in die Rep. alia.

June 4.—The quantity of urine has varied from eight to seven pints, and in other respects he is much the same. He takes now twelve grains of opium in the day. From this till the 11th the amount of urine passed in the twenty-four hours was tolerably stationary at seven pints, and the health was unaffected. On the latter day, however, he complained of drowsiness and headache, and his aspect was rather more anxious than usual.

Aug. dos. Op. ad gr. iv. t. d. Rep. Aq. Calcis, &c.

On the 15th we find that we report the urine at six pints and a half, but that the lad perceptibly loses flesh, and looks ill. On the 21st he felt rather stronger, and was decidedly under the influence of the opium, being drowsy, and having all the appearance of an habitual indulger in that drug. On the 23d he complained of sore throat, at that time prevalent throughout the house, as indeed was scarlatina. The pulse was frequent; the tongue moist and reddish; the countenance pinched and somewhat anxious; the bowels open. The absorbent glands at the angle of the jaw on either side were much enlarged, and excessively painful to the touch. On looking into the throat, the tonsils presented some aphthous specks of ulceration, surrounded by a dark inflammatory suffusion of the lining membrane of the soft palate, whilst his gums had a spongy appearance.

R. Acid. Muriat. ℞xx. Inf. Ros. Gall. ℥vi. Syrup. ℥ss. M. ft. gargar.

By the next day the change was most surprising. The face was cadaverous and sunken, with herpetic eruptions on the lips and *alæ nasi*; the extremities were blue-coloured, and cold; the pulse very small; the depression, both bodily and mental, extreme; the respiration hurried and oppressed; deglutition very difficult; uvula covered with an ash-coloured slough. The external glands, so swollen on the previous day, had nearly regained their natural size. The *æther draught*, bark, and brandy, were immediately prescribed; but the foregoing alarming symptoms made progress, and the patient sank at 10 p. m.

Sectio Cadaveris.—The body was much emaciated, and exhaled, as it had done during the last day of the patient's existence, a peculiar and very disagreeable odour.

In the pouch of the pharynx, and particularly about the *frænum epiglottidis*, were numerous aphthæ, and the mucous membrane presented a dark lurid tint and excoriated appearance. This injected condition of the membrane was confined to the bag of the pharynx, for the *œsophagus*, instead of being morbidly red or purple, was the reverse. For two or three inches below its commencement it was covered with what looked very like false membrane, but which proved to be a deposit of the same aphthous character as the specks in the pharynx. Streaks of this description and minute aphthous pustules extended more or less down the whole of the tube to the *cardia*. Both surfaces of the *epiglottis*, the *sacculi laryngis*, *larynx*, *trachea*, and *bronchi*, presented the same dark injected appearance as the pharynx.

There were three or four ounces of bloody serum in the pleural cavities of either side, but no further marks of inflammation—as lymph, &c. The pleuræ anteriorly on the right side were connected by old adhesions,

but none existed in the left. The lungs were universally fleshy to the feel, and of deep red colour on their section. Air was contained in the larger bronchial ramifications, but not in the ultimate air cells, for the lungs did not crepitate on pressure, though slices of them swam in water. This condition precisely resembled the “*enjouement*” of the first stage of *peripneumony*, and was so considered both by Dr. Chambers and Dr. Seymour. No tubercles whatever could be found.

The stomach contained some ill-favoured, undigested, *vegetable* matters, but was not diseased. In the centre of its lesser curve was a patch about the size of a half-crown piece, looking like a spot of *petechia*. The pylorus and duodenum were perfectly healthy. The liver was rather large, and certainly not natural in structure, although it is difficult to describe the alteration: it looked soft and rotten, yet was quite as firm as, if not actually firmer, than natural. Near its surface was the same *petechical* appearance as that which has been noticed in the stomach. The gall-bladder was flaccid, and contained some shabby-looking bile.

The spleen on its section was so like the liver that on placing them together it was hard to detect any obvious difference.

The kidneys were of good size, and healthy; the renal vessels showed nothing unusual. The bladder was full of urine, not augmented in size, and apparently healthy. The intestines were pale in colour, but otherwise unaffected.

The mesenteric glands were generally enlarged, though none amongst them had attained any magnitude. They were pale, and for the most part soft in texture, but in both these particulars they varied. None of them showed any marks of *scrofula* or suppuration.

Owing to unavoidable hurry at the time of the examination, the head was not opened.

The above case is interesting as affording a dissection in an early stage of diabetes; as showing the effects of opium, carried to the extent of sixteen grains in the twenty-four hours, in that disease*; and lastly, as instancing the rapidity of what we may almost venture to term *cynanche maligna*. We may mention, *en passant*, that when this case took place there were two examples of scarlatina in the house, and the prevalence of that disease out of doors was a matter of perfect notoriety.

* Dr. Seymour, in his clinical lecture on this case, remarked that the quantity of opium here administered was not near so great as had been given with good effect in diabetes. Dr. Seymour alluded in particular to the cases published by Dr. Warren, in which this remedy was pushed to a considerable extent, and apparently with success.

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ON THE

INFLAMMATORY AFFECTIONS OF THE BRAIN AND ITS MEMBRANES :

*Being the Substance of the Croonian Lectures,
delivered before the Royal College of Physicians,
in May 1829,*

By FRANCIS HAWKINS, M.D.

Physician to the Middlesex Hospital.

[Continued from page 166.]

LECTURE III.

Encephalitis.

IN the description of arachnitis, given in the preceding lecture, we have anticipated, in some points, that of inflammation of the substance of the brain; for in treating of the distinctions which exist between the two, we have seen what symptoms are essential to each: we have seen that arachnitis is distinguished by convulsions, delirium, and the symptoms of general irritation; but that partial and progressive paralysis is the characteristic sign of primary encephalitis.

It has been observed by Lallemand, who, as far as I know, was the first to publish the observation, that pure and simple inflammation of the brain neither produces fever, nor causes acceleration of the pulse; whilst these symptoms invariably attend arachnitis, and generally in a marked degree. The reason of this difference may be found not only in the nature of the inflammation, and the structure of the part affected, but also in this circumstance, that idiopathic encephalitis is always a partial disorder, affecting only a portion of the brain; it is attended, therefore, from the first, chiefly with local symptoms, and the longer the disorder lasts, the more cir-

cumscribed it usually becomes, and its symptoms the more local.

It was remarked long ago by Morgagni, that apoplectic extravasations take place most frequently in the optic thalami and corpora striata, in consequence of the large supply of vessels which are sent to those parts. And Lallemand has added, that the same parts, as well as the grey matter of the brain, are for the same reason especially prone to inflammation. I am not, however, aware that this observation has been confirmed and established by a sufficient number of facts.

It has, I believe, been ascertained (however it may be accounted for) that general inflammation of the whole brain can only arise in consequence of previous inflammation of the membranes; for whenever, upon dissection, the whole brain has appeared to be inflamed, the membranes have been found to be inflamed also, and the preceding symptoms have been those which belong essentially to arachnitis. In a case which I had an opportunity of examining within these few days at the Middlesex hospital, the whole of the brain was hard and tough, and exceedingly full of blood, insomuch that the medullary matter had lost its white appearance, and acquired a colour almost as dark as the ordinary shade of the cineritious part. It was evident that in this case the membranes had been also inflamed, for the dura mater was turgid with blood, the arachnoid sensibly thickened, and the pia mater highly vascular. This patient had many years before received a blow on the back of his neck, where a steatomatous tumor was formed. He was under the care of Dr. Macmichael for an affection of the

chest, and for many days previous to death was in a state of delirium, or rather of maniacal excitement. Further, it may be stated, that softening of the cerebral substance, or other kind of disorganization, consequent upon inflammation, can only be produced by partial encephalitis. And the reason is obvious; for whenever the whole brain is inflamed, the disorder proves fatal before disorganization can take place. In cases, therefore, of general encephalitis, the substance of the brain is found to be affected only with the first state of inflammation; that is, it is rendered vascular, and to a certain degree indurated.

Let us examine what are the effects of inflammation when it occupies the substance of the brain.

The first effect is here, as elsewhere, an increased afflux of blood to the part, by which the medullary substance is somewhat darkened in colour, and the difference of shade between it and the cineritious substance is much less conspicuous than in the natural state. When the brain, under these circumstances, is cut with a knife, the number of bloody points which appear after the incision is greatly increased. The brain, too, is rendered turgid; so that in cases of injury, when an opening has been accidentally formed in the cranium, inflammation is said to increase the tendency of the brain to protrude, and to give rise to *hernia cerebri*. There is also a slight induration of the cerebral substance. Such, then, is the state which is always found in cases of general encephalitis, and it may be described as the first stage of the progress of inflammation.

In the second stage, disorganization begins to take place, and there is first a diminution of the consistence of the brain. But this effect does not appear to be the same as that loss of cohesion, and consequent brittleness of texture, which is common to the membranes and all other structures of the body in a state of inflammation, and the cause of which is exceedingly obscure. But softening of the brain appears to be owing to the admixture of an albuminous exudation, or of pus with its substance; and the further this infiltration of pus proceeds, the more white and creamy the brain usually becomes; so that the distinction between grey and white matter is nearly destroyed; but

sometimes a yellow or greenish hue is observed from the mixture of a proportion of blood with the pus.

In the third stage of inflammation of the brain, the pus which was before diffused is now collected into an abscess. At first it is contained in a cavity formed in the medullary substance, with the sides of which it is then in contact; but a cyst is usually formed around it, within which it is subsequently confined.

Dr. Hooper has given representations of three kinds of abscess which are met with in the brain. In the first, the pus is contained in a circumscribed cavity; in the second, it is confined in a cyst; and in the third it is dispersed in numerous small cells. It is a remark of Dr. Baillie's that abscess on the surface of the brain is much more common than in its substance, the former being usually produced by external injury. He also observes that inflammation "is rarely extended over any large portion of the brain, but is rather confined to one or more distinct parts of it;" which agrees with the view which has been here taken of the pathology of encephalitis. He has also described a case of gangrene of the brain, in which he says, that "a portion of the brain at the inflamed part was of a very dark brown colour, and as soft as the most rotten pear." But Lallemand comments on this description, and says that the appearance described by Dr. Baillie bears a great resemblance to *ramollissement* of the grey matter, accompanied with sanguine injection. It is certain that gangrene of the brain, when no injury has exposed it to the air, must at least be a rare termination of disease.

That the matter of an abscess in the brain is capable of being absorbed there seems no reason to doubt; on the contrary, there is every reason to believe that this process does sometimes take place in the same manner as blood extravasated is occasionally absorbed. It has even been thought from an appearance sometimes met with in the brain, resembling a cicatrix, that the two sides of a cyst may possibly adhere together by means of a curative process. But the instances of such an occurrence are too few to establish its certainty; and the formation of a perfect cicatrix must be considered as a termination of abscess in the brain, as singular as it would be fortunate.

Encysted tumors are met with in the brain, containing not only pus, but also serous and albuminous fluids. It appears, therefore, that in cases of effusion of serum or albumen, as well as of the formation of pus, a cyst may be formed to confine the effused fluid; and when blood has been extravasated, a similar process appears to take place, or at least the substance of the brain is hardened round it, so as to resemble a membrane. According to Dr. Hooper's description, "the cyst is formed of one membrane, which cannot be separated into laminæ. It is often of the thickness and texture of the dura mater, but in some cases remarkably thin. Those which are thick are very firm and opaque; the thinner are more delicate, beautifully transparent, and have very much the appearance of animal hydatids. The vascularity of the transparent cysts is seen by vessels carrying red blood ramifying on their surface; but the vascularity of the opaque cysts is not discernible by the naked eye."

In what may be called the fourth stage of inflammation of the brain, we find those numerous accidental formations which have been variously classed and described: but all of them, there is ample reason to believe, are the produce of inflammatory action. They may be referred to four classes. To the first belong tuberculous formations, which are similar in their growth and progress to the tubercles which are met with in other parts of the body. They first become vascular, and are gradually softened, and may be considered as a sort of solid abscess. "We find tubercles," says Dr. Abercrombie, "of firm consistence and whitish colour, varying from the size of a pin's head, or a small pea, to that of a walnut or a small egg, in every part of the brain, either imbedded in its substance, lying on the surface, or attached to the membranes. When they have attained a considerable size they present, when cut into, the usual whitish coloured or cheesy matter, generally enclosed in a cyst; and in the fatal cases we find them more or less approaching to a softened state, or partial unhealthy suppuration. They occur in persons, and in families, in whom a tendency to tubercular disease has otherwise manifested itself; and they are very often combined with tubercular disease in other organs."

It is remarked, however, by Dr.

Hooper, that some of these diseases are erroneously supposed to be of a scrofulous nature. He does not consider as scrofulous the hard, white tubercle which is met with on the dura mater, nor the white tubercle of the corpus annulare, nor the tubercle of the choroid plexus. The formations of this class which are met with in the substance of the brain he divides into the black, the white, the scrofulous, and the bony tubercle.

To the second class of accidental formation belong scirrhus, cancer, and encephaloid tumors. The third contains the cartilaginous, ossous, and calcareous formations; and the fourth, the melanosis, and the sanguineous; or as the French term them, erectile tissues. Dr. Hooper has assigned names to these various morbid growths according to their more obvious qualities, and has given representations of many of them in his *Illustrations of the Morbid Anatomy of the Brain*.

Produced, as they are, by a common cause, they are sometimes met with combined in the same subject, and can hardly be distinguished by symptoms peculiar to each, except so far as their nature may be determined by the character and tendency of the constitution. Thus, scrofulous tumors may be known from the strumous temperament of the individual; or cancer may be suspected from the lancinating pains and sallowness of the skin, which are in some measure characteristic of that disorder.

Again, whatever may be the nature of an accidental formation in the brain, it acts, when formed, as a foreign body; and, being inflammatory in its origin, is capable afterwards of exciting inflammation around it, from which a new train of symptoms may be observed to arise. The chief immediate and remote consequences of inflammation of the brain may be illustrated by the aid of the preparations from the museum of the College, and a few from other sources, which are placed for that purpose on the table before us.

[Preparations were here exhibited of induration and softening of the brain, of abscesses, cysts, and tumors.]

We may now proceed to the symptoms which attend inflammation of the brain.

It has been already stated that the symptoms of *general encephalitis* are the same as those of general inflamma-

tion of the arachnoid and pia mater, without which the former cannot exist. And in this case the inflammation of the brain is acute or chronic, according to that of the membranes which produced it. But the symptoms of *partial encephalitis*, as they are developed in the muscular, sensitive, and intellectual systems, are peculiar to that disorder; and they vary according to the period of the disease, and the situation of the part affected. Let us first consider them as they belong to different periods.

The *commencement* of inflammation of a portion of the brain is distinguished by a partial and slowly advancing palsy; or rather, to describe it more accurately, by a state of rigidity, or, as it is termed, of demi-flexion of the affected limbs. This is its constant and pathognomonic sign. If convulsions are ever excited by pure and simple inflammation of the brain, it can only be in a slight and transient manner; for whenever the convulsive movements have been lasting and strongly marked, the membranes have been found to be also inflamed. Such, at least, has been the case in all the instances which have fallen under my own observation, as well as in the cases that I have read, on the observation of which I could rely, and many of which have appeared the more worthy of credit because related to illustrate other subjects.

The slight convulsive movements, if there should be any, are observed most frequently on the same side with the disease in the brain, but the rigid state of the muscles affects the limbs of the opposite side; hence the mouth is drawn towards the side which is opposite to that of the disease in the brain; and this is exactly contrary to what happens in apoplexy.

Inflammation of the substance of the brain does not of itself appear to produce any direct effect on the respiratory and circulating systems. In those cases, indeed, in which the rigidity of the muscles amounts to positive spasm, the respiratory muscles may be affected by it, and the breathing in that way become hurried and painful; and then it will follow that the circulation will be also quickened. But when the spasmodic paroxysm is mitigated, the pulse and respiration return to their usual standard. Again, in the further progress of the disorder, when congestion in the brain,

or effusion at its base, extend their influence to the medulla oblongata, the respiratory system will then of course become affected.

Inflammation of the brain is by no means attended with that exaltation of the sensorial powers which belongs to the commencement of inflammation of the membranes. It scarcely even appears to excite pain, unless arachnitis be in some degree present. And when it is confined to the substance of one hemisphere, there is no delirium during the early period of the disorder, and little disturbance of any kind in the intellectual faculties.

In what may be considered as the second period of inflammation of the brain, or that which is attended with disorganization of its substance, and which answers therefore to the second and third stages, before described, of its morbid progress, the rigidity and spasm with which the limbs had before been affected, pass gradually into a state of complete resolution; and this state differs from the former, inasmuch as it no longer admits of remedy: it arises from the alteration or destruction of a part of the brain, and not, as the former, from a temporary cause.

The deviation of the mouth now undergoes a change, and it is drawn generally in the opposite direction; for the rigid spasm of the contracted muscles having ceased, the muscles of the contrary side acquire the greater strength, and draw the angle of the mouth in the *same* manner as in apoplexy.

It is most common for the paralysed limbs to retain their sensation when the power of motion is lost. Sometimes both properties are lost together; occasionally, though more rarely, the sensibility of a part is destroyed, when the power of moving it is still preserved.

It is rather from diminished sensibility than from actual paralysis that the natural functions are affected in encephalitis; which, as already stated, has no direct effect upon the muscles of involuntary motion. Hence the obstinate constipation which is common in this disorder may be attributed to diminished sensibility in the intestinal canal.

It has been mentioned that inflammation confined to one hemisphere of the brain produces, at first, but little disturbance in the intellectual functions. One side, therefore, of a double and symmetrical organ being sufficient for

the exercise of the intellect, in the same manner as the sight or hearing may be exercised by one of its organs, it remains to be explained why the further progress of inflammation, or even disorganization, taking place in a single hemisphere, should ever impair the intellectual functions. Now this may, perhaps, be in part accounted for through the pressure made on the sound side by the inflamed, and consequently tumefied hemisphere. Whenever disorganization takes place on *both* sides, or whenever the *whole* brain is greatly compressed, the intellectual functions are always destroyed.

In the third period of encephalitis, answering to the fourth stage of morbid alterations, the accidental formations which have then been developed, destroy the parts in which they are immediately situated, and produce pressure upon those which surround them. Hence paralysis of the parts supplied by the affected portions of the brain is their general characteristic. And whatever may be the individual nature of the morbid growth, it does not on that account appear to be productive of peculiar symptoms.

[To be continued.]

ABSTRACT OF A CLINICAL LECTURE
ON

WOUNDS OF THE THROAT,

Delivered at Guy's Hospital, July 9, 1829,

By C. A. KEY, Esq.

RICHARD LAMBOURN, now a patient in Lazarus' ward, was brought from Blackheath into the hospital on Monday, 29th June, with a severe wound in the throat. His age is about 60; he appears sallow, and possesses what is usually termed the melancholic temperament. From some circumstances, he was incited to attempt the life of his wife, and afterwards inflicted the wound upon his own throat. The wound is deep, and about five inches in extent: the larynx is penetrated just at the upper part of the thyroid cartilage, so as to expose the chordæ vocales and the rima glottidis. The pharynx is opened; so that whatever he takes, in a liquid form, escapes by the wound. He appears, by the account of the surgeon who first saw him, not to have lost

much blood, as there was no necessity for securing any blood-vessel. The muscles on the fore part of the thyroid cartilage are divided. Mr. Hardy applied five sutures to the integuments, and assisted in bringing them in apposition by plaister and lint. He was ordered to be kept perfectly quiet; to have his mouth moistened with barley-water; and to be firmly secured, so as to prevent the dressings or wound from being disturbed. On the morning of the following day we found him in a state of considerable excitement. His pulse strong and quick; his skin hot; tongue brown, and face flushed. He was therefore bled to ℥xvj. and ordered to take, mixed with butter, 5 grs. of hydrarg. submur. with an enema of two ounces of castor oil.

July 1st.—Bowels had been freely opened, and there was less febrile excitement; pulse about 120, not so full. Mr. H. introduced some gruel by means of the stomach pump, which produced less irritation than might have been expected. The dressings having been somewhat disturbed by the saliva and pus which exuded from the wound, they were removed, and fresh ones applied.

2d.—He seems more depressed, and his countenance more anxious; more alive to what is passing about him, and expresses a wish for air. He is troubled with a puriform mucus, and has difficulty in getting rid of it, but without complaining of pain at his chest. The pulse is lower in force and frequency, and not indicative of inflammation. He is therefore allowed beef-tea, with the aid of the stomach-pump. His bowels acting of themselves, he is not ordered any medicine, especially as the difficulty of swallowing makes it doubtful whether it passes into his stomach.

On the 3d he seemed to require more support, his pulse still remaining as frequent, but with less power. He complained of no pain except in the immediate neighbourhood of the wound; his respiration did not appear to be hurried; the discharge was more copious; and the wound looking irritable, a poultice was applied. Beef-tea once a-day, with gruel morning and evening, by the stomach-pump, were continued.

On the following day, finding him rather more irritable, though his pulse did not indicate inflammatory action, and ascertaining that his irritability was

produced by want of rest, he was ordered at night $\text{lx. min. of t. opii.}$ in an enema, with one oz. of ol. Lini. and a glass of wine to be added to his beef-tea. His bowels were regular, and motions healthy. The wound was in a complete state of suppuration; and the ligatures being of no farther use, but perhaps keeping up irritation, were taken away. The interior of the wound appeared sloughy; the cartilage was partly denuded, and its membrane appeared also likely to slough. The wound is deep, and appeared, from its irregularity, to have been effected by more than one stroke of the knife. A portion of lint, moistened with a very weak solution of nitric acid, ($\text{gtt. ij. tr. aquæ. 3j}$) applied to the wound, and a poultice laid over it. The sister was desired to give him a five gr. hyoscyamus pill occasionally, for his laryngeal irritation, if he could swallow; but this was found impossible.

On Sunday, the 5th, Mr. Key visited him soon after he had taken his beef-tea, with his glass of wine, for the first time. His pulse was 115 in a minute, not being increased beyond what it had been for the two last days. His face, however, was slightly flushed, though the temperature of his skin remained natural. He had passed a good night from the opium, which appeared to have kept up its action till late in the morning. On being asked if he had a disposition to cough, or had pain in the chest, or lower down in the trachea, he answered in the negative. His tongue was whitish, but not much furred. "On the whole he may be considered as going on favourably, considering the extent and ill condition of the wound, which has to cast off some sloughs before healthy granulations can arise."

6th.—His bowels having been relieved last night by a castor-oil injection, he is somewhat depressed; but his pulse has fallen to 100, his skin is much cooler, and he is altogether freer from irritation. Dr. Burne, who saw him to-day, thinks that the support should be continued; he is therefore ordered the same as yesterday. On the following days his state was much the same; he seemed to suffer from the opium not being followed by its due effect, and as its operation by the rectum seemed uncertain, he was ordered to take it by the mouth, in his last meal of broth. The wine has been increased

to two glasses. The wound is now daily getting cleaner, and sloughs being cast off and granulations arising.

Although, gentlemen, this case is one of an ordinary kind, being attended with no unusual circumstances, there are some points about it that, if properly considered, cannot fail to be instructive, not only to the student, but to all who have witnessed it. I shall, therefore, confine myself entirely to the points of interest which Lambourn's case presents.

The first thing we have to notice is the application of sutures, a practice generally recommended in wounds of the throat, and one that I usually adopt; I mean not only to the wound of the integuments, but also to that of the larynx. If the cut be extensive to either side, the fibres of the platysma thyoides are divided; and, unless they are counteracted by sutures, they contract and cause the wound to gape, and prevent adhesion from taking place. In this instance, the division of the sterno hyoideus and thyro-hyoideus muscles also rendered sutures necessary. The same disposition in the edges to recede, requires that transverse wounds in the trachea or larynx should generally be confined by sutures. I have not observed that inflammation is more likely to occur when they are employed, nor do they seem to occasion irritation of the trachea, when the lining membrane of the tube is carefully excluded: this latter precaution is easy, for the cartilage and its membrane afford a sufficiently strong purchase to the ligatures, and there is no difficulty in passing them obliquely, so as to avoid the inner membrane of the tube. An objection may be urged against their use, that they rarely have the effect of producing adhesion between the edges of the larynx. In these wounds I cannot say that I have seen an instance of complete union by the adhesive process. The ligatures usually soon ulcerate through, and thus allow the parts to separate; still they are not without their use; for if they retain the parts together but for two days, they enable some portion of the cut surfaces to adhere, and thus diminish the aperture in the air tube. A case occurred under Sir Astley Cooper, in which the epiglottis was cut through at its root; a ligature was run through its base, by which it was attached to the notch of the thyroid cartilage; on

the third day, when it came away, the parts appeared in better approximation than before; and the granulating process so much contracted the wound, that scarcely any inconvenience either in swallowing or in speaking remained.

In the present instance it appears, from the account of the surgeon who was first called to the case, that but little bleeding took place from the wound; and from its situation, there is not much reason to apprehend that the hæmorrhage could have been copious. Having just grazed the upper part of the thyroid cartilage, the instrument has avoided the branches of the superior thyroidial artery, which usually, in such wounds, furnish a most copious source of bleeding; and the wound being below the os hyoides, has also escaped opening the branches of the lingual artery. The latter, indeed, are not so frequently wounded; as, in the act of suicide, the neck being extended, the os hyoides is so much drawn up that the incision is generally made below it. The other large vessels of the neck are not engaged in the wound, and in attempts to destroy life by dividing the larynx they seldom are so, from the projection of the latter organ and from its cartilages not unfrequently being ossified. When it is ascertained that hæmorrhage has been copious, I would advise you to be cautious in your prognosis, not only in this, but in all kinds of wounds from accident. It is an opinion entertained by some, that, when persons have bled freely at the time of an accident, or at an operation, they are less likely to have inflammation supervene: such a remark is frequently made in reference to operations of lithotomy: I doubt its correctness. I have observed that hæmorrhage is usually succeeded by a stage of reaction, which will often terminate in inflammation; and under such circumstances inflammation is with more difficulty contended with, from the previous reduction of the patient's powers. On the contrary, when blood is removed at the onset of inflammation, no such reaction takes place. The effect of the bloodletting will be to abate high action, and so far will be more beneficial. I always think more favourably of a patient when the bleeding is left to the discretion of the surgeon, as the quantity of blood taken away can be duly regulated, according

to the activity of the inflammation and the powers of the patient. The doubt under which a surgeon must labour when hæmorrhage has occurred, is shewn in the following case. Some few years ago a man was brought into Guy's Hospital with a wound in the right groin, in consequence of falling from a ladder with a chisel in his hand. The blade had penetrated under Poupart's ligament to some distance, without its exact extent being known. From the depression of his general powers at the time of his admission, and in the absence of evidence of any very considerable hæmorrhage, it was suspected that the abdominal cavity was opened. There was very feeble reaction, and the man sunk on the third day. On examination, it was discovered that the peritoneum had received a wound of about an inch in extent, and that the external iliac artery had been wounded. There was scarcely any coagulum about the vessel, and none on the abdomen. No doubt this man died from hæmorrhage, although it could not be ascertained what quantity of blood he had lost.

The danger attending wounds of the larynx arises from the inflammation by which they are frequently followed. It would appear to depend, in some measure, upon the part of the larynx that is wounded. Wounds above or below the glottis are much less dangerous than when the sacculi laryngis are incised; at least I have seen more cases terminate fatally when the centre of the thyroid cartilage has been divided, than when the wound has been inflicted higher up, towards the os hyoides. There are three kinds of inflammation to which the larynx is subject, and which prove destructive to life. The adhesive inflammation of the membrane, or that peculiar to croup, is usually an idiopathic affection, and, as far as I have seen, is rarely produced by injuries, excepting perhaps when inflammation is excited by a burn; in which case, from the acuteness of the inflammation, a layer of fibrine is sometimes effused. A second form of inflammation, if it can be so called, is the adematous condition of the glottis, which quickly destroys life by suffocation. It is usually the consequence of previous disease in the neighbourhood of the larynx, particularly of the epiglottis. The part is rendered highly

susceptible, and, from exposure, becomes the seat of sudden effusion, which rapidly obstructs the passage of the glottis, and very soon proves destructive. The other form of inflammation is that in which the membrane of the larynx appears highly injected, and the inflammation, instead of being confined to this organ, spreads along the lining of the trachea and extends to the bronchi. It is this form of inflammation which usually attends injuries, such as I am now describing, and it is similar to what physicians term bronchitis. On examination, the lining membrane of the whole tube is found highly vascular, and the smaller ramifications of the bronchi are loaded with a thick high-coloured mucus, as if the minute air cells of the lungs had participated in the affection. It is of the utmost importance to watch, and if possible to check the earliest symptoms of inflammation of the larynx, for the disease, when once established, is generally beyond control. I have rarely seen patients recover from wounds of the throat when acute inflammation attended as a consequence.

The condition of the larynx in this patient is also worthy of observation; and the opinion, that the epiglottis is not so much subservient to deglutition as it is to modulation of the voice, is in some degree confirmed. He is able to swallow liquids without producing much irritation of the larynx, although the epiglottis is quite detached from the thyroid cartilage, and does not assist, therefore, in preventing liquids or food from passing into the glottis: this latter function is most probably performed by the tongue being carried backward in the act of swallowing, while the larynx is carried forward and upward: the larynx is thus thrust under the tongue. It appears probable that the thyroid cartilage will exfoliate, if not wholly, at least a large portion of both alæ will do so, for the perichondrium is sloughing from the violence with which the wound was inflicted. The internal membrane that lines the cartilage is detached from it, and already appears in a state of active granulation, in order to throw off the dead cartilage, and to organize the new structure that will supply its place. The formation of a new cartilage, and the separation of the old, will be an interesting process to observe: it is probable from analogy that the new structure will not possess the

character of cartilage, but will be ultimately organized like bone. The granulations, you will observe, already possess the peculiar form of the thyroid cartilage, and will form the matrix in which the bone will be afterwards deposited*.

In the treatment of the case you will have noticed two distinct stages, one of excitement, in which inflammatory symptoms threatened; the other, a stage of depression, in which the powers of the patient began rapidly to decline. On the morning following the accident, he had the usual symptoms that occur in inflammation of the trachea and bronchi; a hot skin, a quick pulse, flushed face, and hurried respiration. These gave way to the bleeding and the administration of a mercurial purge. It is also remarkable what effect the latter produced upon his general feelings. For two days he expressed a wish to die; melancholy seemed to possess him, and he had no desire for life, but after the purgative began to operate, his feelings changed, and he then expressed a strong desire to live. You must, however, always be cautious in giving credit implicitly to what is said by persons in Lambourn's situation; they may have motives for concealing their true feelings, and for imposing upon their medical attendants. A man was brought into the hospital many years since with a severe wound of the throat, inflicted after attempting the life of another person. All means were used to save his life, which, from the nature of the wound, seemed highly probable; but in the success of these attempts he seemed not to place much reliance: he daily represented himself as getting worse; whenever the surgeon visited him, he complained of great difficulty of breath-

* Mr. K. noticed the deviation from the usual law of nature, in respect to the exfoliation of the cartilage. Usually a dead portion of cartilage is cast off in the form of bone; such is the ordinary state in which the cartilages of the larynx exfoliate, as we frequently see in the arytenoid and thyroid cartilages, which become ossified before they die. This singular transformation of cartilage may be explained on the principle, that when increased action in cartilage leads to a deposit, the effusion must partake more or less of the nature of bone: thus in chronic rheumatism affecting the articular ends of bones, the cartilage is converted into an ivory mass; in wounds or fractures of cartilages of the ribs, they become united by bone, as if the only effusion which the vessels of cartilage could pour out, must be of an ossific character. In the instance of Lambourn, no action has preceded the death of the cartilage; it died from sloughing of the perichondrium, and the previous ossific process had no opportunity of taking place.

ing, and of pain in the chest and trachea. The officers of police were informed of his getting worse, and told that there was but little chance of his living to undergo the sentence of the law; they relaxed, therefore, in their watchfulness over him, and the nurses gave all the personal liberty they could to the dying man. The fellow having succeeded in making his condition appear so deplorable, got up one night, dressed himself in the clothes of a neighbouring patient, and walking down the ward, went out at the door, left the hospital, and was never afterwards heard of.

To return to Lambourn. The excitement being subdued, his powers began to fail him, and considerable depression was indicated by his pulse, the state of his skin, and his feelings. Combined with this condition of system was a degree of irritation, shewn in the quickness of his pulse, loss of rest, and increased irritability of manner. Depletion would naturally tend to have increased this state; and a mild stimulating plan was had recourse to. The sloughing condition of the wound rendered it probable that the system would feel the irritation attending the separation of the sloughs, and opium was therefore added to his improved diet. I would here observe that the increase of stimulants was but sparingly allowed; the practice of at once giving to a patient, whose strength begins to fail, several ounces of wine and other stimulating diet, is frequently productive of mischief, especially where we have to guard, as in this case, against an attack of inflammation. My general rule is to administer small quantities at first, and to watch their effects on the pulse: at first it becomes excited and accelerated; in a day or two the heart and general system become accustomed to them, and begin again to falter; an additional allowance then again acts upon the pulse, and, as its effects begin to fail, it is again increased. The extent of stimulus is thus proportioned to the wants of the system, and has a more beneficial effect in keeping up the powers of the patient than the exhibition of larger quantities, which over-excite the patient, and render him feverish.

The ultimate termination of the case it is difficult to foresee; although at present he may be considered as going on extremely well. There is some reason to apprehend the effects of

the continued irritation on the chest; disease in the lungs is sometimes set up by laryngeal irritation, and the patient already begins to complain of a slight troublesome cough. His mental condition does not favour his convalescence. He labours under the three-fold impression of having killed his wife, of having nearly destroyed himself, and of a melancholy prospect, should he survive his present wound.

ON A DISEASE OF THE TYMPANUM.

By JOSEPH SWAN, Esq.

(For the London Medical Gazette.)

IN tracing the tympanine branch of the glosso-pharyngeus nerve, which has been so particularly described by Jacobson, much of its distribution may be seen on the transparent membrane lining the tympanum when this part is perfectly sound, but when it is diseased a very considerable difficulty is experienced. In an attempt to trace this nerve in the head of an old woman, the membrane lining the tympanum was not only thickened but there was at the same time some roughness of the bone. In the head of a man, who had a suppurating node on the forehead, and whose posterior nostrils were stopped up by adhesions of the soft palate, this membrane was also thickened; the sphenopalatine ganglion was very considerably enlarged. In the dissection of the head of a very young woman the schneiderian membrane, covering the inferior turbinated bone of the left nostril, adhered very considerably to that of the septum, so that a very little passage was left for the air; there was a perforation in the membrana tympani of the same side, and purulent matter was contained in each tympanum. The membrane lining the tympanum was so much thickened that the nerves could not be observed.

I believe deafness does not so often depend on a disease of the portio mollis as has been supposed, but much more frequently on an inflammatory action attacking the membrane lining the tympanum, and involving these small branches of the tympanine nerve. There are very few deaf people who cannot hear music or singing, or who cannot hear conversation, whilst they are in a carriage in motion. But it is not so

with those who are nearly blind, for when the optic nerve is paralysed, no light, nor any modification of it can produce perfect sight, and it must be the same with the auditory nerves with respect to sound. I will not deny that a very strong light may enable a person who has a slight degree of vision to see some objects almost in the same manner as a very deaf person hears with a speaking trumpet. I believe, therefore, that deafness depends very frequently on the inflammatory action having impaired these minute branches of the glosso-pharyngeus nerve, which are distributed on the tympanum; and although many of the noises may depend on the disordered functions of the portio mollis, I nevertheless think they may arise, too, from these small branches of the glosso-pharyngeus, and their communication with the grand sympathetic in the carotic canal. It may be asked how music, &c. dispose the ear for receiving the fainter sounds, as those of the voice. I conceive these excite the parts about the tympanum in the same way that stimulating things would any other organ; and that by this excitement such a degree of action is imparted to the whole as is present in a healthy state of the organ. When the functions of the gustatory nerves are impaired, people cannot taste properly; but when these have been stimulated with a little wine, the taste again becomes exquisite. This may not be thought a fair argument; but I conceive the wine becomes a local stimulus, although it may, at the same time, be a general one, and by both means effect the same purpose.

The consideration of the distribution of the tympanine branch of the glosso-pharyngeus, leads to the conclusion that the tympanum performs more important functions in the production of hearing than have been usually ascribed to it; and that the failure of remedies in cases of deafness, which have been termed nervous, may have proceeded very much not only from the obscure situation of the tympanum, but from the misapplication of the remedies themselves. And I conceive, therefore, as a thickening of the membrane lining the tympanum, and involving such delicate nerves, can be so often observed, that many of the diseases of the ear may be more within the reach of art than has been contemplated; and that by subduing the inflammatory action at its

very onset, before the structure of the delicate parts has become so much changed as permanently to impair their functions, many of the worst cases might be prevented.

6, Tavistock-Square,
June 9th, 1829.

MELANOSIS OF THE STOMACH.

To the Editor of the London Medical Gazette.

SIR,

I HAVE no doubt that you will consider the subjoined case of melanosis of the stomach, and disease of the liver, as worthy of record; if so, your giving it insertion in your valuable journal will greatly oblige

Your obedient servant,

RICHARD HOCKING,

Member of the Royal College of Surgeons, Surgeon to the Penzance Dispensary.

Penzance,
10th July, 1829.

Mr. C——, æt. 67, a tall athletic man, master of a vessel, but who had not been much in hot climates, requested my opinion on his case.

August 12th, 1828. — He states, that for some time past he has been troubled with dyspeptic symptoms, which of late have very much increased, so that he was advised by his medical attendant to try change of air; hence he left his home, (Guernsey) and visited this place. He now complains of pain, and great fulness in the epigastric region; this part, when pressed, feels extremely hard and tense; taste ill-savoured; tongue slightly furred in the centre, red at the tip and sides; continued nausea; frequent vomiting of a dark melanotic fluid, mixed with small flakes of coagulable lymph; bowels costive; evacuations of a pitchy black, sizey appearance, having a very offensive smell; urine scanty, of a light straw colour; countenance anxious, of a dirty sallow hue; pulse small, from 85 to 90 in a minute; legs and feet œdematous; abdomen slightly distended.

The treatment consisted of small doses of calomel, with pulv. opii. grj. twice or three times a-day; moderate doses of castor oil at night; a drink, composed of barley-water, acidulated with acid. sulph. This method appear-

ed to relieve him for a short time, when all at once the symptoms came on with increased severity, which continued for some days, when on the 4th Sept. he died.

Sectio Cadaveris 12 hours after Death. — On opening the abdomen, (which contained some water) the first object that struck my attention was the enormous size of the liver. This organ was increased to nearly three times its usual dimensions; it extended across the epigastrium, over the stomach, a long way into the left hypochondrium, pushing the diaphragm upwards as far as the fourth rib; downwards it reached into the pelvic cavity, covering a large portion of the colon, and small intestines. In structure and texture it was completely changed, being very much indurated and compact, of a light brown colour, interspersed with numerous white spots, (the white tubercle of Baillie) of various sizes, giving it very much the appearance of pudding stone. There were firm and strong adhesions between it, the stomach, colon, and parietes of the abdomen. The gall-bladder filled with a dark vitiated bile. The porta gorged with blood.

The stomach was filled with an inky fluid, the emptying of which presented to view a most exquisite specimen of that very rare species of cancerous degeneration known by the name of "melanosis." This disease was situated at the pyloric extremity of the viscus, extending three or four inches up towards the cardiac orifice, and also a short distance into the duodenum. On the internal surface of this diseased portion there were numerous deep excavated ulcers, of various sizes, filled with a black matter, besides many black softened points, going into ulceration. On cutting through this diseased mass, at the situation of the pyloric valve, it was found to be nearly one inch and a half in thickness, of a semi-cartilaginous texture, and of a blackish colour; it appeared to increase in consistence from its internal surface to the centre. The black matter was so mixed up with the substance of the diseased structure that it was with extreme difficulty it could be washed away; and even at the last ablution, the water was stained of an inky blackness, with the small quantity of black substance that then remained.

The other viscera of the abdomen and

thorax were pretty healthy, except that the semilunar valves of the aorta were thickened and slightly ossified.

Although this very extensive disease must have been of long standing, yet the symptoms till within a few months of the death of the patient were not sufficiently clear to warrant the opinion that very great organic alteration was going on in any of the abdominal viscera, and which evidently shows that there may be very great structural derangement, both of the liver and stomach, without any more severe symptoms being evinced than are attendant on common indigestion. In the latter stage of the complaint, notwithstanding the diagnostic marks were sufficiently clear to point out the nature of the disease of the stomach, yet there was no symptom present to demonstrate any considerable disease of the liver. No jaundice, no high coloured urine; in fine, no mark that could evince any alteration in the quantity, or the quality of the bile. The assimilative faculty could not have been much impaired considering the great organic affection of two organs of such essential utility to the proper performance of this important function; for on opening the abdomen a tolerably thick layer of adipose matter was evident beneath the skin. From the increased size and indurated state of the liver one would be led to imagine that the mechanical impediment to the circulation through the large abdominal venous trunks would have created early and extensive dropsical effusion, but the contrary was the fact, for effusion did not take place till a short time before death, and even then sparingly.

DR. HARRISON AND HIS PATIENT.

To the Editor of the London Medical Gazette.

SIR,

IN the *Lancet*, dated June 27th, appeared Dr. Harrison's account of what he styles his "celebrated struggle;" and in the same article a shameless and cowardly attack on the character of a lady, formerly his patient, but at present under my surgical care. I will not occupy much of your space, but confine myself to relating a few facts which will enable the profession to form

a correct estimate of the skill and integrity of this gentleman. In order to do so, it will be necessary to give a short history of Miss Orton's case, and it may be right to mention here that I am actuated by no other feeling but the desire to protect my esteemed patient from the undeserved calumny heaped upon her.

Dr. Harrison first commenced attending Miss Orton in the early part of June 1824, previous to which time she had been for many years under the care of Mr. Cheshire, of Hinckley, for a lateral curvature of the spine. At this time she was about thirty-eight years of age, and had been afflicted with this distressing malady upwards of twenty-eight years. Upon consulting Dr. Harrison, *he most confidently promised to effect a cure* provided she would consent to submit to his treatment. Unfortunately she did consent, and you shall now be made acquainted with the process and consequent result. The patient was placed on one of the Doctor's cribs, and perpetual recumbency enjoined as absolutely necessary, besides which an *iron shield*, extending the whole length and breadth of the back, was constantly affixed to the patient night and day, with the addition of *six pounds of shot on one shoulder!* These were constant companions: but this was not all; from day to day the doctor was in the habit of performing his operations, which consisted in first attaching the patient firmly to the head of the crib, by leather straps affixed to the shoulders, (she being turned over on the face); meanwhile the ankles were incased in a kind of leather gaiter, from which strong leather bands went to an iron windlass of considerable power, by which the unfortunate back was thus forcibly elongated through the medium (be it remarked) of the shoulder and ankle-joints. During the time these elongating processes were continued, the Doctor made considerable pressure against the curvature by means of an iron or brass instrument resembling a common boot-hook; and after having kept up this barbarous farce for three years, he discovered that the back was four inches longer than it had been before this treatment was commenced.

In order that nothing might be wanting, the patient, during the process, was constantly dosed with medicines; and, with your permission, Sir, I will quote three or four prescriptions from the

hundred lying before me, which will be sufficient to convince the most sceptical on this point*.

It will scarcely be credited that these practices were continued from June 1824 up to the early part of July 1827, when the extreme bodily weakness induced absolutely prohibited their longer continuance.

Such was the state in which Miss Orton found herself after having submitted to this martyrdom for three years, and, be it remarked, at an expense of *upwards of five hundred guineas in fees!!!* no hopes being held out either of an amended state of bodily health, or of ever being rescued from the recumbent position; and she was now left entirely to herself, for this generous Doctor, finding the patient's fees and patience both worn out, contented himself with calling once a month, and then merely to order a repetition of some of his delectable prescriptions.

I say, sir, under these circumstances, can it be wondered at that this lady determined to be trifled with no longer—that she resolved, in spite of threats, to consult some one who, at least, would pay common attention to the numerous and distressing ailments she then laboured under, and from the effects of which every one who knew her believed it next to impossible for her to recover.

About the middle of June 1827, Emma Edwards, Miss Orton's female attendant, and also mentioned by the Doctor, was suddenly seized with apoplexy, and being the nearest practitioner, and having prescribed for her before, I was called in. She recovered and thus originated my introduction to Miss Orton, whom I have had the honour of attending ever since, a sufficient proof that she and her friends are satisfied. She is now so far recovered as to be able to bear the upright position, and walks pretty well with the assistance of an instrument which has been constructed under my direction;—but to the point.

When Dr. Harrison was informed that my opinion had been sought, he

* Various prescriptions follow, with which, however, we deem it unnecessary to trouble our readers. Among them is one we have already published, at p. 724 of vol. ii. and which may be taken as an illustration: it contains an heterogeneous mass of ingredients, among which are the *Acet. Ammoniac* and the *Liq. Acet. Ammon.*—*ED. GAZETTE.*

became, to use his own words, "justly alarmed," and his "alarm" was increased to "horror" and "affright" when he was told, on receiving his dismissal, that it was the intention of her present surgical attendant to publish the whole case in the Journals of the day. Then it was that, instead of "strictly interrogating" Miss Orton, he *entreated*, as a last request, that she would not allow the case to be exposed, and he actually extorted a promise to that effect. Soon after his last visit to Miss Orton, this dignified personage condescended to employ *an ignorant woman* to wait upon Miss Orton*, in order to get his prescriptions out of her possession; and upon finding the request treated with the contempt it merited, he had recourse to threats, and actually spoke of sending his solicitor. He moreover endeavoured to work upon the fears of his former patient by threatening to drag her aged father and friends into court: but all was of no avail—the prescriptions were lodged in my possession. Sir, your readers will find that, in the Doctor's account of the trial, he says, "a long pause ensued, which was interrupted by a call for Miss Orton. The name no sooner vibrated on my ears than I became fully alive to her duplicity and hypocrisy, but the knowledge came too late to admit of my attempting to rebut her evidence on the present occasion."

Now, to this man's shame and confusion be it known that months before the trial came on he was fully aware that Miss Orton's prescriptions would be produced, *for I sent him due notice by the medical friend who attended him into court on the morning of the trial*. Let him deny it if he can. I assured his friend that I had numberless prescriptions, and that they should every one be given up to the College authorities if they required them; and yet he tells us, with unblushing effrontery, that not until Miss Orton's name was mentioned in court was he prepared to expect her opposition!!

* This same respectable lady called upon me, and, under pretence of asking my advice, she endeavoured to get at my opinions of Dr. Harrison. One question was, "I should have consulted Dr. Harrison, but I understand he is a quack; is it so, sir?" Being on my guard, I answered accordingly; and upon her leaving my house, one of my pupils traced her to the house the Doctor frequented in order to get his information. Yet the Doctor complains of the "mean arts" employed against him.

I could go on, but your excellent and truly disinterested article in a former number of the Gazette must have convinced every one, if proof was wanting, of the true character of this vain boaster, whose ignorance and effrontery entitle him to the contempt he has met with, in pursuing his "tortuous track" in the "sacred cause." Apologizing for the length of this, allow me to subscribe myself,

Yours very respectfully,
F. P. BURRELL PICKTHORN.

30, Southampton-Row, Russel-Square,
15th July, 1829.

REMARKS ON THE TENDENCY
TO
CALCULOUS DISEASES;

With Observations on the Nature of Urinary Concretions, and an Analysis of a large part of the Collection belonging to the Norfolk and Norwich Hospital.

BY JOHN YELLOLY, M.D. F.R.S. &c.

[Concluded from page 172.]

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PART I.—*Of the Tendency to Calculous Diseases.*

IN the instances which I have mentioned, it would therefore appear that the tendency to produce calculous complaints is greater in towns than in the country; and if this should prove to be the case generally, it would seem to indicate the existence, in children more particularly, of a connexion between some diathesis which prevails in towns, (probably the scrophulous), and the tendency to the secretion or deposition of lithic acid, on which the origin of urinary calculi so much depends. I have not had it in my power to ascertain whether the greater disposition of towns to calculous complaints, applies more extensively than I have mentioned. I think it probable, however; but in some cases in which I had expected to be able to connect the reports of the numbers operated upon, in a particular town or district, with a certain known population, the records were not sufficiently ample to afford the requisite information. I did not therefore avail myself of the well-known kindness and courtesy of the medical officers of other provincial establishments, to trouble

them with inquiries which the plan of their registers might not, perhaps, give them the means of satisfying.

If I might venture, however, to make the suggestion, I would respectfully submit how subservient our public hospitals, the boasts and ornaments of the country, might be made to important statistical inquiries, by a more extended system of registry than is at present usually adopted, either in the metropolis or in the country; and how conducive to pathological improvement the information would be which they might thus be so readily enabled to furnish.

Soon after the alkaline nature of Mrs. Stephen's remedies for stone in the bladder was made known by her in 1739, in consequence of the recompense of 5000*l.* adjudged by parliament for the disclosure, it was found by Dr. Hales that caustic alkalies had the power of dissolving calculi out of the body. But Dr. Rutty*, and some years afterwards Dr. Dawson†, discovered that this substance was limited in its operation to certain descriptions of calculi; while others were capable of being dissolved by nitric or muriatic acid alone; and hence they concluded, that in the latter cases acids might be regarded as important lithontriptics. The subject, however, was not pursued; and these experiments, with the curative deductions made from them, were entirely lost sight of.

The precise nature of lithic acid was afterwards discovered by the celebrated Scheele; and for a long period subsequent to his time, urinary calculi were uniformly supposed to consist of this material, and alkalies alone employed in the treatment of the diseases which they occasioned. It is singular, however, that the calculi which formed the subjects of that great chemist's experiments, as well as of Bergman's, should have been so little varied as not to have led to the observations which had been before made by Drs. Rutty and Dawson; and which would, in all probability, have opened the way to the further important discoveries in urinary concretions, which we owe, in so great a degree, to the perspicacity and talents of Dr. Wollaston.

Part II.—Of Urinary Concretions.

When I proposed an examination of the urinary calculi belonging to the Norfolk and Norwich hospital, I had the expectation that my attention would have been materially circumscribed by the previous labours of Dr. Marcet, who visited Norwich some years before, for the express purpose of examining the collection. I found, however, that none of the calculi contained in it were divided, and that the experiments instituted by our lamented colleague (of which an account was published in his work on Calculous Diseases), were therefore necessarily confined to the outer surface, except in cases where the calculus had been broken in the extraction, and its interior structure thus allowed to be seen.

Within the last four or five years a certain portion of the calculi have been divided; and these, as well as such as were broken in the extraction, amounting together to about 330, I have carefully analysed.

Calculi consisting principally of one deposit.

Lithic acid	81
Lithate of ammonia	20
Oxalate of lime	20
Phosphate of lime	4
Fusible calculus, or mixed phosphates; that is to say, calculi composed of the triple, or ammoniaco-magnesian phosphate, united with phosphate of lime	37

Calculi consisting of two deposits.

Lithic acid and lithate of ammonia .	37
— oxalate of lime	11
— mixed phosphates	10
— phosphate of lime	2
Lithate of ammonia and lithic acid .	2
— oxalate of lime	25
— mixed phosphates	14
— phosphate of lime	1
Oxalate of lime and lithic acid . .	10
— lithate of ammonia	1
— mixed phosphates	15
— phosphate of lime	3
Mixed phosphates and phosphate of lime	2

Calculi consisting of three deposits.

Lithic acid, phosphate of lime, and mixed phosphates	2
— oxalate of lime, and phosphate of lime	1

* Account of some New Experiments, and Observations on Joanna Stephen's Medicine for the Stone.

† On Human Calculi, shewing them to be of Different Kinds. — Medical Transactions, published by the College of Physicians of London, vol. ii. p. 105.

Lithic oxalate of lime, and lithate of ammonia	2
— oxalate of lime, and lithic acid	4
— lithate of ammonia, and oxalate of lime	2
— acid, oxalate of lime, and mixed phosphates	1
Lithate of ammonia, oxalate of lime, and mixed phosphates	3
— oxalate of lime, and lithic acid	8
— phosphate of lime, and lithate of ammonia	1
— lithic acid and mixed phosphates	2
Oxalate of lime, lithic acid, and lithate of ammonia	1
— lithic acid, and oxalate of lime	1
— lithic acid, and mixed phosphates	2

Calculi consisting of four or more deposits.

Lithate of ammonia, oxalate of lime, lithic acid, and mixed phosphates	1
Oxalate of lime, lithic acid, oxalate of lime, and mixed phosphates	1
Lithate of ammonia, oxalate of lime, phosphate of lime, oxalate of lime, and lithate of ammonia	1

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In this table it will be seen that about one half of the specimens are composed of one description of material only, and that the remainder consist of alternating layers, more or less numerous, of most of the substances of which human urinary calculi are composed.—On each of these substances I shall make a few observations.

Of lithic acid and lithate of ammonia.

The distinction between these substances, though very generally recognized abroad, does not appear to have been much attended to in this country till it was noticed by Dr. Prout, about nine years ago, in the *Medico-Chirurgical Transactions**; and afterwards, by the same gentleman, in his important and interesting work on *Calculous Disorders*. The existence of lithate of ammonia, as a frequent component part of calculi, was distinctly pointed out, under the name of urate of ammonia, by Messrs. Fourcroy and Vauquelin, in their paper on *Animal Concretions* in the *Annales des Chimie* for 1799†; but

as they very singularly omitted all notice of Dr. Wollaston's celebrated communication on a similar subject, which appeared in the *Philosophical Transactions* two years before*, it is not a matter of surprise that the labours of these very eminent chemical philosophers did not, in this department, obtain an authority in this country which an appearance of greater candour must unquestionably have ensured them. Feeling, however, as I do, that Dr. Wollaston's paper, even after a lapse of above thirty years of the most active and successful period of chemical investigation, is not only to be regarded as a model of elegant and accurate deduction, but as containing nearly every thing of importance which is yet known on the subject of urinary calculi, I must still do Messrs. Fourcroy and Vauquelin the justice to state my conviction that their operations were independent of those of our distinguished countryman. They were the first to notice lithate of ammonia; and their claim to originality may even derive some degree of support from their having overlooked the most striking characteristic of the fusible calculus, noticed in Dr. Wollaston's communication,—ready fusibility, notwithstanding they were aware of the existence, as separate substances, of both the sets of materials of which it is composed, and knew also that these substances are frequently united. The subject, it is also to be observed, was not a new one with them; for it appears from a paper which was published in the *Annales de Chemie* for the year 1793†, that M. Fourcroy had been engaged, at various periods since the year 1787, in prosecuting researches into the nature of animal concretions, during which he materially enlarged the bounds of our acquaintance with those substances.

Several of the specimens in the Norwich collection bear a close resemblance to the plate which M. Fourcroy gives of a calculus of lithate of ammonia‡. They are small, gray, and laminated; and in addition to the usual characters of lithic acid, elicit ammonia copiously, on the addition of pure potash. Like those

* On Gouty and Urinary Concretions.—*Philosophical Transactions* for 1797.

† Analyse Comparée des différentes Espèces des Concretions Animales et Vegetales, tom. xvi. p. 23.

‡ *Annales du Museum d'Histoire Naturelle*, tom. i. pl. vii.

mentioned by Messrs. Fourcroy and Vauquelin, they are likewise generally derived from young subjects.

The combination of ammonia with lithic acid is not, however, confined to small calculi, or to those which occur at an early period of life. It is to be found in calculi of all sizes, and belonging to all ages. But in such cases, ammonia invariably communicates a lighter colour, and diminishes the cohesion of the calculus, as indicated on the addition of pure potash; though there is not, except occasionally towards the centre, the laminated structure of early life. In a few instances, the appearance of the lithate of ammonia calculus is not very dissimilar to the chalk-like excrement, or rather urine of the Boa Constrictor, which, as is well known, consists of lithate of ammonia*.

Immersion, for a few days, in pure ammonia converts yellow laminated lithic acid, whether in small masses or in powder, into light-coloured lithate of ammonia, from which ammonia is readily evolved by the action of pure potash, after that which is loosely adherent has been carefully separated by distilled water. But the artificial addition of ammonia does not, as far as I have observed, communicate any degree of decrepitation to a lithic calculus, as might be imagined from an observation of Dr. Prout. It seems to be exceedingly likely that some, at least, of the specimens of lithic calculus, which gave rise to Scheele's discovery of lithic acid in urinary calculi, really consisted of lithate of ammonia; since we are informed, that in his original experiments, a disengagement of ammonia took place during the solution of the subjects of his analysis in liquid caustic potash, which would not have been the case if the lithic acid on which he operated had been pure and uncombined.

The lithic calculi form, as is usual, the most numerous class of concretions in the Norfolk collection, where they amount to nearly a third of the whole

number analysed. But when, in addition, we take those into account which have lithic acid, or lithate of ammonia as a nucleus, it appears that nearly three-fourths of such number (namely 238 out of 328) either consist of the lithates, or have those substances as their nuclei.

The same observation may be made as to about two-thirds, or 27 out of 41, of the calculi belonging to the Cambridge Hospital, of which the kindness of Dr. Haviland, the Regius Professor of Physic, and my other medical friends of that flourishing and well-regulated establishment, allowed me the particular inspection.

In the collection of calculi belonging to the University of Leyden, which I had an opportunity of examining about two years since, by the courtesy of Professor Sandford, 38 out of 49 specimens which it contained, or three-fourths of the whole, bore the character which I have just mentioned.

Dr. Henry, of Manchester, published a valuable analysis in the *Medico-Chirurgical Transactions* some years since, of 187 calculi; and of those 158, or five-sixths, were also either lithic calculi, or had lithic nuclei*. The evidence, therefore, which is derived from places far distant from each other, agrees as to the similarity in nature of the primordia of by far the larger proportion of urinary calculi; and evinces, that in appreciating the tendency to calculous disorders, and the means by which it is to be obviated, the attention must be particularly directed to the circumstances under which lithic acid is formed or developed. The importance of this attention is put in a very striking point of view by Dr. Prout, when he says, "that if a lithic acid nucleus had not been formed and detained in the bladder, two persons at least out of three who suffer from calculus, would never have been troubled with that affection."

A deposition of the phosphates is not, according to Dr. Prout's experience, followed by that of the other materials of calculi; and in this important particular my observations, with hardly an exception, agree with his. Sometimes, indeed, I have seen little studs of lithic acid, or lithate of ammonia, imbedded in the mixed phosphates; but these appear to have descended from the kidney,

* Dr. Prout states to me, that he has never seen a calculus, essentially of lithate of ammonia, taken from a person after puberty; and is of opinion, that there are at least two varieties of the combination of lithic acid with ammonia, if not more. It is exceedingly likely, that it is owing to the different quantities of ammonia with which lithic acid, according to this very probable idea, is capable of being combined, with some diversity, perhaps, in the admixture of other substances, that the varieties observable in the appearance of lithate of ammonia, in calculi, are to be attributed.

as small calculi, and to have attached themselves to the phosphates during their existence in the bladder; for the laminated form which those phosphates often assume is not interrupted under such circumstances, but only slightly altered in direction. Notwithstanding, however, the well marked character of the different species of urinary calculi, or their varied laminæ, there is still hardly a single deposit with which a small portion of some of the other ingredients is not blended; a circumstance which probably arises, (as in the case of muriate of ammonia) from the readiness with which urine parts with a minute portion of most of its component parts.

Of oxalate of lime.

The calculus of oxalate of lime has been generally designated as the mulberry calculus, from its resemblance, both in shape and colour, to a mulberry. Its appearance, however, varies from the darkest brown to a milk white, not differing much in colour from the fusible calculus. Its texture is generally tuberculated, or nodular; but this substance not unfrequently exists, in bright amber-coloured, or transparent white crystals, of the shape of flattened octohedrons. This form was noticed by M. Fourcroy in concretions taken from the bladders of some animals, and was particularly observed by Dr. Wollaston in three human calculi shown him by Dr. Marcet. There are not less than twenty examples in the Norwich collection of such crystallization; and I have seen a few examples elsewhere. I had occasion to observe a similar form of crystal in two or three small calculi of oxalate of lime, taken from the bladder of a rat by a medical student some years since, and also in a calculus taken from the bladder of a pig. I have since found that concretions of a similar description and form are by no means uncommon in the former animal.

Of the triple phosphate, or ammoniaco-magnesian phosphate.

This substance is rarely found in its simple state, except as minute, transparent crystals, deposited between other laminæ. The nearest approach to it seems to be in the irregular white, or yellowish, or brownish white crystallization, which is not unfrequently found on the surface of the mixed phos-

phates. This crystallization I have always found to contain a small quantity of lime; and it must, therefore, I presume, be considered, according to the division adopted by Dr. Wollaston, as belonging to the fusible calculi, or those consisting of the mixed phosphates, but possessing, perhaps, the smallest quantity of lime, which enters into the composition of this form of calculus. Dr. Prout is inclined to view it as having some unknown, but regular, proportion of the two sets of ingredients. The varying proportions of the two phosphates seem, indeed, (as Dr. Marcet very judiciously observes,) to communicate every degree of fusibility to the calculi which are composed of them.

The usual mode of detecting minute quantities of the triple phosphate is, I believe, that recommended by Dr. Wollaston, of observing the formation of a white lime, by the deposition of the crystals of that substance, on any part of the glass vessel containing them, which has been rubbed by a glass tube, or other pointed instrument. I have employed, however, what appears to me a still more ready mode of ascertaining the formation of the triple phosphate, by placing the fluid expected to contain it, in a watch-glass, in the field of a compound microscope of moderate power. The triple crystals are thus capable of being observed at the period of their earliest formation; and their gradual increase of size, and union with each other in various accidental ways, but mostly in a stellated form, come within immediate view, and form an interesting subject of observation. It is the more desirable to have a ready and unequivocal mode of determining the existence of minute quantities of the ammoniaco-magnesian phosphate, in the examination of animal bodies, as the production of that substance affords a means, to which it is difficult to find a limit, of ascertaining the existence of ammonia, magnesia, and phosphoric acid.

Of phosphate of lime, and the mixed phosphates.

During my analysis of the Norwich collection, I was accidentally led to suspect that carbonate of lime, though very unusual in urinary calculi in a separate and distinct form, was not an unfrequent concomitant of phosphate of lime. A particular examination of

the collection, with a view to this special point, convinced me that such was the case. The existence of carbonate of lime was evinced by effervescence, on submitting a portion of the powdered calculus to the action of dilute muriatic acid, in a small tube, after boiling it in distilled water, to extricate the atmospheric air involved in it. The gas evolved was readily absorbed by pure potash over water; while pure ammonia deposited the phosphate of lime, leaving a portion of fluid, from which lime was thrown down by oxalate of ammonia. The same circumstance likewise happened when the muriatic solution was evaporated to dryness, and the dried portion submitted to distilled water; the muriate of lime, formed by the solution of the carbonate being dissolved, and the lime precipitated in the form of oxalate, by oxalate of ammonia. Carbonate of lime I have likewise seen in the mixed phosphates, and so extensively as to induce me to think it probable, that phosphate of lime is seldom or never found in urinary concretions, either separately or in combination with the triple phosphate uncombined with carbonate. This circumstance seems to be the less unlikely when it is considered, that carbonic acid gas has been found to exist in a pure state in urine, and separable by the mere aid of diminished atmospheric pressure. This being the case, it may fairly be expected to unite with some portion of lime during the evolution of the latter, instead of suffering the whole of it to be employed in forming oxalate, or phosphate of lime.

I am happy in having had the kind assistance of Dr. Prout, and of Mr. Faraday of the Royal Institution, in ascertaining the existence of carbonate of lime in some of the specimens of calculi in which that substance is not usually looked for. To Dr. Prout the circumstance was not unexpected; for he has long considered the existence of carbonate with phosphate of lime in human concretions exceedingly likely, though he had not put his ideas to the test of experiment. An important confirmation of these observations I have likewise met with in a paper by the distinguished Spanish chemist Prout, who states, that in every instance of urinary concretion which came under his observation, he found carbonate of lime when there was phosphate*.

In one or two calculi of mixed phosphates, which are in Dr. Prout's possession, we found carbonate of lime; and the courtesy of Sir William Blizard, the chairman of the Board of Curators of the Hunterian Museum, gave me the opportunity of making the same observation in some of the specimens contained in that noble collection. I likewise had the particular favour from Dr. Benjamin Babington of not only examining with him, with the same result, several calculi of his small but valuable collection (many of which are duplicates of those in the museum of Guy's Hospital), but of being permitted the loan and full use of his cabinet, which gave me the important opportunity of instituting more ample experiments than were at all admissible with the calculi belonging to the Norfolk and Norwich Hospital, where it was of course necessary to be limited to the smallest portion requisite for correct analysis.

I have likewise always found carbonate of lime in combination with phosphate, both in concretions formed in various parts of the body, and in prostatic calculi, (one of which I examined at the College of Surgeons,) although both sets of substances are generally regarded as consisting of phosphate of lime alone. The same observation has been made by Dr. Prout, as to several similar substances which have come under his notice.

No specimen of cystic or xanthic oxide has yet been found in the Norwich collection.

ACCOUNT OF THE PLAGUE.—EFFICACY OF STIMULANTS.

By R. R. MADDEN, Esq.
M. R. C. S.

Alexandria, July 30, 1825.

AFTER two years' residence in the City of the Plague, I endeavoured to overcome the indolence which this enervating climate produces in all Europeans, and curtail my *siesta*, to inform you of my movements in "the land of bondage." It unfortunately, or perhaps fortunately happened, that the period of my arrival here was ushered in with the first four cases of plague. Every Frank was in quarantine, the hotel was infected, and a lodging was no where to be found; I was obliged to return to my ship. The

* Annales de Chimie, tom. xxxvi. p. 263.

captain was a native of the *bocco di Cattaro*, an excellent man; he treated me during the voyage with bordeaux and champagne, and would not receive a farthing for my passage. I was forced to tax his hospitality for some days after our arrival: an English merchant had then the kindness to break through his quarantine, and received me into his house. The plague daily increased in violence, 18 a day of the natives perished, and few days passed over without the death of Europeans. For so small a population as that of Alexandria, say 16,000 souls, the mortality was considerable. Every house was shut up, the servants were not suffered to go out, money was passed through vinegar before it was touched, letters were smoked, papers were handled with tongs, passengers in the streets poked unwary strangers with their sticks, to avoid communication, people thronged round the doctors' shops to know how many died in the night, the plague was discussed at breakfast, contagion was described at dinner, buboes and carbuncles (*horresco refferens*) were our themes at supper. The laws of infection were handled by young ladies in the drawing-room; "a cat could communicate the plague, but a dog was less dangerous; an ass was a pestiferous animal, but a horse was non-contagious. Fresh bread was highly susceptible, but butchers' meat was non-productive." If you looked at a man, he felt his groin; if you complained of a head-ache, there was a general flight; if you went abroad with a sallow cheek, the people fled in all directions; if you touched the skirt of a Christian's coat, you raised his cholera; and if you talked of M'Clean, your intellect was suspected to be impaired. Heaven preserve you from a quarantine in Egypt! It is not the death of one's neighbour which is so overcoming—I am now accustomed to coffins—I can hear of a case next door without a sympathetic pain in my axilla; but it is the horror of eternally hearing of plague—it is the terror of contagion, which is depicted in every face—it is the presentation of pestilential apparitions and discourses to the eye and to the ear, morning, noon, and night, which make a house in quarantine a lazar domicile, for the anticipation of death and the anatomy of melancholy.

Already I have lost one servant: I

took him with me, two days before his attack, to a Turkish house where a man was said to have apoplexy—I found, on examination, it was the plague. On my return I changed my dress; I gave the clothes to my Maltese boy to hang up on the terrace, and from them I have every reason to believe he took the disease. The second day after this I observed him staggering as he walked, his eyes had the expression of a drunken man's, his features were tumid, and yet he complained not. I asked him in the evening if he felt unwell? he said he had a cold; but I perceived he could hardly keep his feet: his pulse was very frequent, but easily compressed, and not full; his tongue was of a whitish-brown in the centre, with the borders very red.

I saw the poor fellow had the plague: it was impossible to keep him in the house where I was, as my own stay was an extension of courtesy on the part of Mr. C. that I could have hardly expected, subjected as I daily was to the danger of contagion. I took him to the hospital; but before he entered, he begged me to let him call on his brother. I accompanied him to the brother—he shook hands with him, notwithstanding my caution, and left some message to be given to his mother. When we arrived at the hospital I saw him shudder (and well he might): he said to me, "Don't you recollect, Sir, I said in the *Bazaar*, that health is above every thing?" I never was more uncomfortable—I felt as if I was in some sort accessory to his disease. Head-ache and nausea distressed him from the time he was put to bed; he shivered frequently, but he said "his heart was burning." At night two livid spots were discovered on the fore-arm, with purple streaks, extending to the axilla, and terminating in a bubo. His skin was parched and burning, his eye glaring on one object; and when his attention was called off, he talked incoherently, and complained of his tongue becoming swelled. His pulse at sunset was 118, small and obstructed; his features swollen and of a sallow crimson hue; but next morning his colour was of a darker purple, such as denoted congestion somewhere strangling the circulation. His regard was constantly fixed on the ceiling, and the low thick muttering of his lips had been incessant during the night. At four o'clock he

bounced out of bed, escaped unnoticed, passed the outer door of the hospital, and ran, naked as he was, several yards in the direction of his home; but here he was overtaken by the people of the pesthouse; he had just sunk down quite exhausted. The strength of death, which had carried him thus far, was now gone; and, with the help of two Arabs, he was borne back to his dungeon (for it deserved no better name), trailing his feet, and his head sunk on his bosom. I saw him two hours after this: the bubo was the size of a small orange, the two livid spots had become large carbuncles, his eyes were glazed, yet unnaturally brilliant, and his fingers were playing with the bed-clothes. At dusk the rattling in the throat was accompanied with spasms of the muscles of the neck; these went off, and after a couple of hours, without any apparent suffering, he died.

The apprehension of infection leaves little time for one to lament his friend's being carried off by this appalling malady; but still this poor fellow's fate affected me more than I can tell you. The necessity of sending him to the plague hospital was painful to me, for he who enters it leaves hope behind him.

The pesthouse consists of several small rooms, with a grated window opposite the door facing the east, as if intended for receiving the poisonous wind of the desert. There is neither chair nor table in this dungeon; the sole furniture is a cane bed, called a *cafass*, with a mattress, and a sheet, which serves for a shroud a little later. The door is generally locked on the unhappy patient, an Arab attendant sits smoking his pipe outside, and very rarely enters to moisten the burning lips of the sufferer, or to lessen the terror of his solitary confinement; once a day the Italian doctor enters the room, orders a decoction of marshmallows, or elder flower water, and then departs.

Of all human horrors, earth has nothing to compare with the dismay depicted on the features of the sick in these dreadful receptacles of pestilence!

I saw the body of my poor servant dragged out by the feet, to make room for a new inmate, who probably in forty or fifty hours more was doomed to make a similar exit. About the chest and back of the deceased I observed large patches, of a livid leaden hue; there

was no offensive odour from the corpse; the carbuncles were small on the surface, having fallen on some internal organs; and the bubo had almost disappeared.

In this case I endeavoured to prevail on the doctor to employ remedies I had found highly advantageous in plague, namely, brandy, wine, and bark; but he refused, alleging that Dr. Marpurgo, the celebrated Jew physician here, had made various experiments with *stronger stimulants*, namely, *prussic acid* and *nux vomica*, and had done no good; on the contrary, all the patients had died. I did not wonder at it!

Three days after my servant Paulo's death, his brother, whom he visited on his way to the hospital, was seized with the disorder: he had the same symptoms, and died on the fourth day*. His wife, who attended on him constantly, did not take the disease; but a person in the house, who casually entered the apartment, was seized next day, and died the third day.

I am endeavouring to illustrate this scourge of the Levant by facts, for I disclaim all theories: in a science like that of medicine, where there are no general rules, there can be no unerring and universal principles; and, above all, in an anomalous disease like that of plague, he who soars into the clouds to analyze the floating particles of miasma—to search after the causes of the *fomes*, and not to study its effects—to prove that the disease be infectious only, or contagious only—taken only by the breath, or only by the touch—to waste research and learning on mere terms, cavilling about distinctions between endemics and epidemics, but never turning attention to the treatment of the disease—that man, I say, may acquire notoriety by the novelty or inge-

* The wife was indefatigable in her attentions to her husband, and, at his death, her affliction was excessive. I saw her tearing out her hair by handfuls: she was a Maltese. In one month after his death, in her mourning garments, I saw her the bride of a young tailor boy, of 17 years of age.

It is a very curious fact, and one noticed by all plague authors, that during a pestilence the people become so demoralized, as to give way to the most libidinous passions and disorderly behaviour, both men and women. Another patient of mine, a Spanish woman, in Alexandria, who fell ill of rheumatic fever, induced (her friends said) by immoderate grief for the death of her husband, on her recovery, six weeks exactly from the time of her husband's death, married the foreman of her deceased lord.

nuity of his theories, but he is not likely to lessen the mortality of the disorder.

I have given you no account of plague while I was in Constantinople or Candia, though it was abundant in both places during my stay, and though I had the treatment of 46 cases. The reason is, I was constantly perplexed in my opinions—one day having good grounds for supposing plague to be contagious, another day that it was infectious, and another day that it was neither. There was only one thing constant and unequivocal, and that was the ultimate event: almost every patient I treated, or saw treated in Constantinople, was bled, purged, and vomited, to keep down the *inflammatory fever*, and every patient died exhausted. The exceptions were very few. I went to Constantinople with a firm belief in the doctrines of Dr. M'Lean—they were plausible, and the very violence with which they were urged had something to recommend them to a young man. The first case I attended was with Dr. Perussel, an old Frenchman, who considered himself contagion proof, and with good reason, for he had been for many years handling plague sores with impunity; he was always in high spirits, and was very seldom sober. It was a very curious fact, that all the attendants in plague hospitals, who have become aged in the midst of pestilence, are all drunkards. This first case of mine was in the slave bazaar of Constantinople, a place which few Franks have been allowed to enter; our patient was lying on a bench in a public coffee-house, surrounded by people smoking and drinking coffee; he had a bnbo in the arm, which had burst, and into this the doctor thrust his finger, and desired me to do the same; but notwithstanding I was a non-contagionist, I thought it wiser to believe in the doctor's description of the tumor, than to paddle in its interior: I contented myself with feeling the exterior. We bled this poor man and purged him, *to abate his fever*—next morning we found him dead. We attended, a few days after this, a woman who had been 23 days ill of plague; she took purgative medicine, and died on the 28th day. Her slave died under the same treatment a week after. In short, in all our cases we did as all other practitioners did—we con-

tinued to bleed, and the patients continued to die.

My landlady became exceedingly uneasy on my account, for the safety of her house: she told me, that as she understood I went into the bazaars and visited plague patients, I must either quit her house, or submit to be smoked in a small room, which is common in Turkey for that purpose, every day on coming home, and change my apparel; to this I consented, and I daily underwent a purification which almost smothered me.

A short time before I left Constantinople, Mrs. W., a beautiful young woman, caught the disease. I was dining with her sister when the news was brought, and you may easily conceive the consternation of her family. This poor lady, *as usual*, was largely bled: it is unnecessary to say she died soon after. Her father never left her bedside, holding her in his arms, soothing her inquietude, and respiration her last breath, and yet he took not the disease; but several weeks after her death, when two servants were sent to open the apartment, which had been closed, and to remove the bedding, one of them, immediately on entering, complained of the closeness of the chamber; next day she had plague, and died in some few days. This happened after my departure—Dr. Belfour gave me the account.

This is one of many proofs I have had of the influence of the mind over this disease. In no other complaint is this influence so marked. The man who is apprehensive of contagion is always the first to take the disease; fear is the predisposing cause of plague; bad living and bodily debility are the proximate causes of the susceptibility of pestilence. I have always observed those who were most deeply interested in the patient's fate—his father, mother, or wife—and who were constantly by his bedside, were seldom attacked; while the servants and strangers, who entered the room now and then, were generally infected. I have known many Turkish houses, however, in Constantinople, which have been shut up after the death of every individual within the walls.

[To be continued.]

MEDICAL GAZETTE.

Saturday, July 25, 1829.

“Licet omnibus, licet etiam mihi, dignitatem *Artis Medicæ* tueri; potestas modo veniendi in publicum sit, dicendi periculum non recuso.”—CICERO.

OPERATION OF APPLYING A LIGATURE ON THE DISTAL SIDE OF ANEURISMS.

HAVING directed the attention of our readers to the operation recently performed by M. Dupuytren of applying a ligature on the distal side of an aneurism of the subclavian artery, we think it right to make a few observations upon the result, which has been unfavourable. We remarked that the circumstances under which this trial of the method of Brasdor was made, rendered it in some measure an *experimentum crucis*; and, undoubtedly, if the operation had succeeded, this would have been the case: its admissibility, under particular circumstances, could no longer have been denied. When we attached so much importance to this particular case, it was under the impression that the patient would either recover, or that, if he died, it would be from one of two causes; viz. either the effect of the operation, or the progress of the disease. Any of these results would have led to a definite conclusion: the first would have been satisfactory, and both the others would have been against the operation, though not in equal degrees; for if the patient had died as a direct consequence of the measure, as happened in some of the cases which have been published, it would have told more decidedly against the practice than if the operation had merely proved insufficient to arrest the aneurism, as in the case of Mrs. D.

But it appears to us, after the most deliberate consideration of the case,

that in this instance the death occurred from neither of these causes, but in consequence of the treatment. This may appear a bold position when the great and merited reputation of the surgeon is considered; nevertheless we submit that there were errors both of *commission* and *omission*, which warrant this opinion.

The patient had hemorrhage from the wound on the fifth day after the operation, to the extent of six ounces: he was bled twice; had a good night, without any return of hemorrhage, but on the 18th is acknowledged to have been “*fort affaibli*.” Now the question is under such circumstances, having been twice bled the day before—the hemorrhage having entirely ceased for twenty-four hours—and the patient being very much reduced, was he in a state to justify further depletion without some very pressing indication? This question *we* should answer in the negative; nevertheless, he was bled again. On the 19th still there was no return of hemorrhage, and no symptom is mentioned as indicating the propriety of depletion, yet was he bled once more. On the 20th he continued in the same state of extreme depression, with repeated fainting fits; and now, at least, we should expect the lancet to have been laid aside, but not entirely so; a *conditional* bleeding was once more directed, and apparently would have been put in force, had not the patient in the meantime expired.

We have been informed by one who saw the operation performed, and visited the patient on the third day after it, that a great impression had been produced on his mind by the circumstances under which he was placed: he was aware that his case was one of no ordinary nature, and that great importance was attached to the result. The effect of this was a state of excitement which he appeared to control by a considerable effort of self-command.

When questions were addressed to him, he answered them distinctly, but in a subdued and guarded tone, carefully avoiding any unnecessary exertion, or turning his head either to the right or to the left. This unfavourable state of mental excitement was, perhaps, the unavoidable consequence of the circumstances in which he was placed. At all events the patient was evidently in a state very unfavourable for bearing depletion. But a great apprehension of hemorrhage seems to have been entertained from the first by his attendants, for he was bled twice after the operation before any hemorrhage occurred. And although he only lost six ounces of blood altogether from the wound, he is represented as having been exceedingly reduced. Now, suppose that the hemorrhage had returned, what worse off would the patient have been than he was from the bleedings, which were intended to prevent it? It may be objected, indeed, that in the one case a definite and moderate quantity was abstracted, and that in the other the loss of blood might not, perhaps, have been under control. In this way it became necessary to balance between the risk of hemorrhage and the danger of depletion. But, again, admitting the former hazard to have been as great as was apprehended, we would ask whether repeated small bleedings were calculated to obviate the danger? Do we not frequently see patients lose *small* quantities of blood again and again from wounds till their systems are actually blanched, without the tendency to hemorrhage being removed? Do we not see the arterial system roused to increased action by the repeated abstraction of small quantities of blood, while that fluid itself becomes so attenuated as to be incapable of forming a firm coagulum. Accordingly, that the hemorrhagic tendency was not over-

come is shewn by the dressings having been stained of a red colour on the day before the patient's death.

The effect of one or two large, and of repeated small bleedings, upon the system, are totally different. The abstraction of a large quantity not only empties the vessels so that they cease to act with force, but it at the same time increases the tendency to coagulation, two very important steps in averting hemorrhage. Thus we see in certain cases of hemorrhage that the very source of danger proves the medium of safety, and when all remedies have been used without avail, nature, through the beautiful principle above alluded to, seals up the bleeding vessels. A case still more in point was recorded in our number of the 11th inst. (see p. 191):—A patient in the hospital at Lisbon had the common carotid tied for a wound in the parotid gland. After many days, hemorrhage came on from the lower orifice of the artery. The loss was so sudden and so great that the patient fainted, but as soon as he recovered he was bled from the arm, and thus the impression was kept up. The hemorrhage never returned, and it was not deemed requisite to bleed him in order to prevent it. Now, with regard to the case more particularly under consideration, we are of course far from denying the propriety of bleeding to arrest hemorrhage; but we submit that a full and efficient bloodletting having been adopted to such an extent as to make an impression upon the system, the patient ought not to have been subjected to farther depletion of this kind unless the hemorrhage had returned. Then, indeed, it would have been a delicate point to decide how far, under such circumstances of depression, the venesection ought to have been carried; but as it is, the patient seems to us to have perished from the quantity

of blood abstracted from the arm to prevent him from dying of hemorrhage by the wound.

But another circumstance connected with the treatment, in which the fault, not of commission, but of omission, is scarcely less conspicuous, is the neglect of purging. The patient actually had no stool from the time of the operation on the 12th till the 21st, when he died. This must have been a great additional source of irritation, and we venture to suggest that free purging, and exposure to the open air, would have been a more efficient and safe mode of removing any tendency to increased arterial action than that which was adopted.

We have never been in favour of the proposal of Brasdor, and certainly the present case is little calculated to add to its reputation; although the patient did not, according to our opinion, die of the operation, still the dissection disclosed two very important facts—viz. that there was a small aperture at the site of the ligature, which probably depended on ulceration; and what is still more important, that there was not the smallest appearance of a coagulum above it. One point, however, is omitted in the account of the dissection, and that is a description of the branches arising above the ligature, either from the portion of artery between the ligature and the aneurism, or from the aneurism itself. This would have been in so far satisfactory, as it *might* have tended to account for the non-formation of a coagulum. But even without this information, the events of the case are sufficient to render it a matter of great doubt whether Brasdor's operation can be applied with success to the treatment of aneurism of the subclavian, by ligature of the axillary artery beyond the tumor.

The circumstances we have above alluded to, lead us to believe that this patient would have died whatever prac-

tice had been adopted; and in the criticism which we have ventured to offer, we have merely been desirous of discussing general principles, without intending the slightest disrespect to the eminent individual by whom the case in question was treated.

Some of the French writers seem to be as premature in their announcements of success as the partizans of this operation have been among us. Alluding to this skill and high character of M. Dupuytren, a French Journalist observes with regard to this very case, that while another man would have left the patient to his fate, M. Dupuytren, on the contrary, stepped forward to his rescue. Thus, adds our Parisian contemporary, "*il opere, il reussit: honneur au genie, honneur a qui montra la voie!*" Alas! before this congratulatory apostrophe was published, the object which called it forth was dead, dissected, and buried!

PULVERIZATION OF CALCULI IN THE BLADDER.

ON Friday last, the 17th, Baron Heurte-loup, whose attention has been so successfully turned to the improvement of the mechanical means for breaking down stone in the bladder, exhibited the instruments which he employs, and gave a demonstration of their mode of action and the method of using them, to a meeting of professional gentlemen, among whom were Sir A. Cooper, Mr. Brodie, Mr. Copeland, and Mr. White, at the house of the latter, in Parliament-Street.

The first instrument shewn was that of which the profession has been for some time in possession, "*l'instrument a trois branches, avec un foret simple,*" by which the stone is laid hold of and acted upon by a simple drill; with this, when the diameter of the stone does not much exceed that of the drill: it is at once broken down. For small stones this contrivance is quite sufficient, not so for those which are large; because, since it acts by perforation, it is only after a long process and repeated drillings that the object can be attained; and M. H. shewed one stone, (not a human calculus), the size of a small

walnut, through which fifteen perforations had been made without its breaking up. It is requisite, then, that we should possess more expeditious and certain means of destroying calculi the diameter of which might exceed eight or ten lines. For this purpose M. H. has contrived the following means.

Second instrument, "*l'instrument a trois branches, avec le mandrin a virgule*," applicable to stones of from eight to twelve lines in diameter. With this the calculus is first perforated, as in the preceding case, and the hole then enlarged to the extent of from six to twelve lines, so as to excavate the interior of the stone, and break it up.

Third instrument, "*pince a forceps*," adapted to stones from twelve to eighteen lines in diameter, calculi of which size cannot be caught in the instrument with three branches, but they are readily so in the *pince a forceps*, and firmly retained till they are broken up.

Fourth instrument, "*le brise coque*," intended to crush the flat or concave pieces resulting from the breaking-up of the stone by means of the instruments already described: hence the name, which might be rendered the "shell-breaker." This instrument is also adapted to the destruction of small stones in the bladder, for with it, twenty or thirty may be crushed in the course of ten minutes. It alone is applicable to the breaking of flat stones, which would evidently resist the action of the other instruments.

Such, then, are the mechanical combinations which we now possess for the destruction of stone in the bladder, without having recourse to the operation of lithotomy. It will be seen that they resolve themselves into three different principles—perforation, excavation, and crushing.

The perforations may be executed by merely directing an assistant to hold the instrument. For excavating, it is necessary that the patient should be placed on a bed provided with a mechanical contrivance for holding the instrument after its introduction. One of these beds was exhibited, and seems to us admirable for the purpose; indeed we think it might be used with advantage in the ordinary operation of lithotomy, as the contrivance is such as to render the process of binding the patient "hand and foot" unnecessary. The third method, that of crushing,

requires no other means in its application but the hands of the surgeon.

The two latter methods are due to M. H., and the instruments which he has invented and employs for attaining them obtained for him the surgical prize of the Institute of France. They have been frequently employed in practice with success, and to all present they seemed admirably adapted to the object in view. It is to be kept in mind that this method is not to supersede the operation of lithotomy, which must still be resorted to in those instances where the stone exceeds eighteen lines in diameter.

M. Heurteloup is a very intelligent surgeon, who explains every thing in the most open and candid manner. He is to give other demonstrations, and we would advise all those who may have an opportunity, to take advantage of them*.

ABUSE OF OPIUM IN SCOTLAND.

THE accounts published in the newspapers of a recent atrocious murder perpetrated on board a steam-boat in the Clyde, contain some points of interest in medical jurisprudence.

Dr. Corkendale, Dr. Fleming, and Dr. Ure, examined the contents of the stomach of the deceased, and were satisfied that it contained laudanum, from the taste and smell. This evidence seems to have been taken as conclusive of the presence of opium. Another circumstance brought to light is the extraordinary consumption of laudanum, as a stimulant. Mr. Scruton, who keeps a chemist's shop, stated that laudanum was very much used among the lower classes in Glasgow; and that he had known from three to four ounces taken for the purpose of producing its stimulating effects. "The smallest quantity they ever sold was a drachm." Mr. Milner, also a chemist, knew two cases in which an ounce and a half was taken twice a-day. This is a melancholy and alarming statement, and tempts us to ask with Othello, though his application of the paragraph was somewhat different,—

"Are we turn'd Turks, and to ourselves do that
Which heaven hath forbid the Ottomites?"

* Another demonstration took place on Tuesday, at which Sir William Blizard, Sir A. Carlisle, &c. were present.

EXTRACTS FROM JOURNALS,

*Foreign and Domestic.*TEST FOR VEGETABLE AND ANIMAL
MATTER.

THE nitrate of silver is the test which Dr. Davy thinks to be one of the best for detecting the presence of organic matter in solution. A pure solution of this salt is not altered by the sun's rays; but if the minutest quantity of animal or vegetable substance be dissolved in the water, the solution is discoloured: with common distilled water, the discolouration is strong. To prove that the cause of change assigned is the true one, it is only necessary to decant the colourless solution and expose it again to sunshine; however powerful the sun's rays, no further effect will be produced unless a little more common distilled water be added, and then it reappears. When used as a test for such substances, of course any chloride of silver that may be formed in consequence of the presence of muriates should be allowed to subside in the dark, and the subsidence should be complete before the fluid is decanted and exposed to light.—*Jameson's Journal*.

VELOCITY OF THE BLOOD IN CIRCULATION, AND RAPIDITY OF SECRETION.

Numerous experiments on these points have been made by M. Hering, Professor, at Stutgard, upon horses, into whose jugular vein was inserted a solution of hydrocyanate of potash and iron. After some time, veins were opened in other parts of the body, and the blood taken out allowed to stand until a little clear serum could be removed from it; this being placed on white paper a few drops of a solution of sulphate of iron added, and immediately after a drop of strong muriatic acid: the hydrocyanate, if there, was immediately indicated by the blue colour. After being bled, the animals were killed, and traces of the introduced liquid sought for in the secretory organs and their products.

The solution introduced into the jugular vein of the horse runs the course of the circulation, and arrives in the jugular vein of the opposite side in from 20" to 25", or from 25" to 30". It arrives in from 23" to 30" in the external thoracic vein of the opposite side; in 20" at the vena saphena major; in from 15" to 20" in the mesenteric artery; in

from 20" to 26" in the maxillary artery; and in from 20" to 25", and from 25" to 30", in the metatarsal artery,—always on the opposite side to the place of injection. The velocity of the motion does not appear to be increased in the ratio of the pulsations of the heart; for in cases where the pulse was 60, 36 to 44, and 48 to 52, per minute, the results were the same. In one case the circulation was a few seconds slower.

The salt used was promptly secreted by the serous membranes, but only in small quantities, and that in the direct ratio of their distance from the heart. None was ever found in the cerebral cavities. The mucous membranes caused its secretion less quickly; but a few minutes sufficed to shew its presence at their free surfaces, and soon after at their other surfaces. The mucous membrane of the right half of the stomach secretes more promptly than that of the intestines, and the latter more rapidly than the surface of the lungs. The mucous surfaces, covered with an epithelium, (as the walls of the mouth, the pharynx, the left half of the stomach, in the horse), gave no traces of the ferro-prussiate.

It was found, but with difficulty, in the liver, spleen, thyroid gland, &c. because of their dark colour. The salivary glands separated much of it. The kidneys, also, act powerfully upon it. It was found, after one minute, in the cortical and tubular parts, and in the pelvis. The small blood-vessels of the kidneys gave indications of it before the large ones, from whence it would appear either that the circulation is slower in the former, or that the salt commences its separation beforehand.

The saline solution adheres in some cases to the sides of the blood-vessels, and is then easily discoverable, but more frequently it does not. The cause of the difference is not known. The shortest time which it takes to reach the thoracic duct is not known: a minute was sufficient in one case, and from two to five in others. It appears a little later in the lymphatic ganglia, from which it is supposed that a direct communication between the arteries and lymphatic vessels exists.

The foreign substance introduced is quickly ejected by the secretory organs, especially the kidneys. In from five to eight hours, traces of it had disappeared from the secretions, and in twenty-four hours, from even the solid and every

other part. The ferro-prussiate of potash produces no inconvenience to the animal.—*Zeitschrift für Physiol.* ii. 85.

SUICIDE.

It appears from a report of M. Serres on some statistical observations by M. Fabret, that, among men, the greater number of cases of self-destruction occur in those who are unmarried; while among women, the number of married who commit suicide greatly preponderates. With regard to age, in men, the greatest number of suicides are perpetrated between the ages of 35 and 45, in women between 25 and 35. The next period in man is between 45 and 55, a time of life at which very few women destroy themselves. But again there are twice as many instances of suicide among girls than among boys under the age of 15. The month of April is most prolific of cases of suicide among men, while among women few occur in this month, but a great number in August. With regard to the means of self-destruction adopted,—in men there is a marked preference for fire-arms and cutting instruments; in women, for poison, throwing themselves from a height, and asphyxia from the fumes of charcoal. As to the causes leading to the event—love and jealousy produce more than twice as many acts of suicide in women as in men; on the other hand, reverses of fortune cause three times as many in men as in women, and disappointed ambition five times the number.—*La Clinique.*

OBSERVATIONS ON A HUMAN MONSTER BELONGING TO A NEW GENUS.

M. Geoffroy St. Hilaire, in May 1829, read to the French Academy of Sciences a memoir on a new production of the human species, struck with monstrosity in the fourth month of intra-uterine life, and on the occurrence of circumstances which produced the monstrosity, by disturbing a formation, which until that period was regular. On the 26th April last, was born, in the Rue du Faubourg St. Martin, of a woman aged 24 years, who had no children previously, a child of regular period, and of large size. On measuring it, from the projection of its eyes, its length was found to be twenty inches. The upper region of the cranium was wanting. The woman had been attended by Madame Fremaux, midwife, and

Dr. Brion, both residing in the same street. The latter has drawn up a notice, in which he has described the defects of the conformation which the child presented. M. St. Hilaire remarked, that it is to him, therefore, that the observation in question belongs. At a meeting of anatomists called by Dr. Brion, one of the medical men present made the most singular assertions as to the causes of the monstrosity. “The monster has large eyes,” said he, “which is because the mother had her view constantly fixed on large eyes which she singularly loved. It has long and pointed ears, because the imprudent mother had her caressing hands continually upon the long ears of her dog.” M. Geoffroy St. Hilaire mentioned this fact for the purpose of ridiculing the explanations which some medical men still give of cases of monstrosity. After enumerating the different kinds to which the monster in question may be referred, he shewed that it comes nearest to the *Thlipsencephali*. Now, in this monstrosity, the foetus going on in a regular manner until about the fourth month, only deviates at a later period, and under the influence of some violent cause, from the normal organization. Confiding in his previous researches, he did not hesitate to declare, that the mother of the new and very singular *thlipsencephalus* which was before him, had been rudely struck about the third or fourth month of gestation, and even added that it was probably by a violent kick. This explanation was utterly rejected by the medical man who had proposed the singular one mentioned above. On questioning the woman, it was in fact discovered, that, at the period of four months’ gestation, she had actually been struck and severely wounded by a violent kick, which hit upon the right side of the uterine region. Dr. Brion’s inquiries led him to the following results:—

Conception took place on the 19th June, 1828; lesion produced by wound, 17th November, 1828; birth accomplished on the 26th April, 1829; total duration of gestation, 282 days.

Until the period when she was struck, that is to say, during the first four months of gestation, (112 days), the mother enjoyed excellent health; but from the 17th November to the period of delivery (during the next five months) she did not cease to experience in the

lower abdomen, and in the whole pelvic region, pains more or less acute, which she attributed to the brutality of which she was the victim. It was also a kick on the lower belly which had produced the organic deviations of the second species of *thlipsencephalus* observed by M. Geoffroy; but this species, as well as the first, presented smaller dimensions, the individuals to which they belong having been only sixteen inches in length. On examining with more attention, and with the aid of dissection, the new *thlipsencephalus* which was submitted to him, he found that it differed from the first two by characters so important, that he was led to consider it as a new genus, to which he gives the name of *Nosocephalus*. Like the *thlipsencephalus*, it is the natural and almost necessary result of a violence exerted upon the organ which contains the product of conception, only at a more advanced period than that at which the deviation would lead to the production of a *thlipsencephalus*. The author concluded with some considerations respecting the theory of monsters. Recurring to the observation which formed the subject of his memoir, he remarked, that the manner in which it was possible to guess, from the inspection of a monstrous production, the cause to which the monstrosity should be referred, and the differences of deviation observed in the *nosocephalus*, which accord so well with the more advanced period at which the perturbing accident took place, leave no doubt respecting the theory of the formation of these kinds of monsters; so that at least, in well defined cases, science possesses facts which may be considered as attaching themselves to principles sufficiently demonstrated to be capable of being applied to use in the practice of medicine. The theory is so perfect in this respect, that, on the inspection of certain monstrosities, it is possible to assign the month, the week, and almost the day, on which the perturbing accident has interrupted the regular order.—*Jameson's Journal*.

FEMALE CHILD WITH TWO HEADS.

M. Geoffroy St. Hilaire presented to the Academy of Sciences of Paris, on 25th May, 1829, a drawing of a monster, which was living at Turin in the beginning of last March, and was two

months and a half old. This drawing, and the news of the event, were communicated to him by Professor Rolando and M. Jules Arthaud, a French physician. The individual represented is a girl with two heads. The lower parts alone are common to the two individuals: the rest is separated, and presents the conformation proper to the normal state. The priest, seeing in this creature two distinct individuals, baptized each of them separately: one received the name of Ritta, the other that of Christina. They were born at Sassari in Sardinia, in the beginning of March 1829. Their common size is that of a child at the full term. Ritta appeared to be suffering. The father has the intention of carrying them to Milan, whence he is to go to Geneva. There have been examples of such monsters living to a pretty advanced age. In the reign of James VI. of Scotland, and at his court, there lived a man who was double from the navel upwards. The king had him carefully brought up. He made rapid progress in music. The two heads acquired several languages: they disputed together, and the two upper halves sometimes even beat each other. In general, however, they lived on good terms. When the lower part of the body was tickled or pricked, the two individuals felt at the same time. When, on the contrary, one of the upper individuals was irritated, it alone experienced the effects. This monster lived to the age of twenty-eight. One of the bodies died several days before the other.—(*Rerum Scot. Hist. auct. G. Buchanan*). In 1723, M. Martinez observed at Madrid a bicephalous man, who was shewn there for money. Sigebert also says that he saw a child double above and single below. The one ate, the other did not. They often fought together. One of them dying, the other scarcely survived four hours.—*Ibid*.

MORTALITY AMONG LEECHES DURING STORMS.

That atmospheric changes have a remarkable influence upon leeches, is a well established fact. In 1825, M. Derheims, of St. Omer, ascribes the almost sudden death of them at the approach of, or during storms, to the coagulation of the blood of these creatures, caused by the impression of

the atmospheric electricity. This opinion, which at that time was the result of theory, he confirmed, in the month of March last, by direct experiment.—*Bulletin Univer.*

HOSPITAL REPORTS.

HOTEL DIEU.

Case of false Aneurism of the Brachial Artery, with some Observations on the Ligature of Arteries, by M. Dupuytren.

A YOUNG man, twenty-two years of age, was bled in the arm for some complaint connected with plethora. The operation was performed in the median-basilic vein, which the surgeon trans-fixed and punctured the artery. Florid blood flowed in a jet, which carried it to a great distance. Perceiving what had happened, the operator, after the necessary quantity of blood had been abstracted, proceeded to make graduated pressure on the wounded artery. The hæmorrhage was at first arrested, but it returned several times. Anxious about his condition, the patient came to the Hotel Dieu. Nine days after the accident (9th of June), a tumor as large as a nut, soft, fluctuating, and presenting pulsations synchronous with those of the pulse, was found at the bend of the elbow. On pressing the artery *above*, the pulsations ceased; on pressing it *below*, they were increased. The wound in the vein was cicatrized.

On the 10th of June the patient being laid on a bed, with the right arm in a state of supination, an incision, two inches and a half in length, was made above the bend of the arm, in the course of the brachial artery. The sub-cutaneous cellular tissue was found infiltrated with blood; the fibro-cellular sheath, which invests the median nerve and brachial artery, was dense, thick, and easily torn; a very large vein which presented itself across the incision was divided, and the artery and nerve brought into view; a ligature was passed between them by means of a cannula and stylet. M. Dupuytren believed that he had passed the instrument under the artery alone; but on raising it the patient experienced great pain, with

numbness along the course of the nerve. By careful dissection the artery was now insulated, and a ligature placed beneath it and tightened. No pain followed, and the pulsations in the tumor instantly ceased, as well as the circulation generally throughout the fore-arm. The lips of the wound were brought together by means of adhesive straps, and the ligature carried out at one of the angles.

No accident retarded the recovery; the fore-arm retained its natural colour and temperature throughout. On the third day the pulsations of the radial and cubital arteries were perceptible, but not apparent in the tumor. On the tenth day the ligature came away, and the wound was almost entirely healed. On the nineteenth day the patient was fit to be discharged.

This case furnished M. Dupuytren with an occasion to make some important practical remarks, in the course of which he pointed out that the operation of tying the brachial artery, generally looked upon as so simple, may nevertheless present various difficulties. The chief difficulty to which he alluded was that of completely separating the artery from the nerve. According to the statement of M. Dupuytren, sufficient care is not in general taken to effect this separation, to which he devotes very minute dissection, often occupying a very considerable time. The case affords an example of success from the application of a single ligature placed between the wound and the heart. All, however, are not so fortunate, and in many instances the surgeon is compelled, in order to guard the patient against all risk of hæmorrhage, to tie both the upper and lower end of the vessel. M. Dupuytren related the following case, from his private practice, in illustration:—A gentleman recently arrived in Paris was mending his pen, and in the act of cutting the point, which was placed on the nail of his left thumb. At this moment, the handle of the knife, which was in his right hand, slipped from him: the knife was thrown up several feet into the air, and falling perpendicularly on the anterior and outer part of the left forearm, the blade, which was extremely sharp, opened the radial artery. A copious hæmorrhage followed. A surgeon was forthwith sent for, by whom the nature of the accident was recognised, but he hoped that pressure alone might

succeed. This he applied very methodically, by means of graduated compresses and a roller, extending from the tips of the fingers above the point of injury. This remained for several days undisturbed, during which no bleeding took place, and when the dressings were removed it was found that the wound in the integuments was healed. But at the same time an aneurismal tumor was already formed. It was hoped, nevertheless, that pressure perseveringly applied, would effect a cure. This hope proved fallacious, for not only did the tumor remain, but it increased every day. M. Dupuytren was now called in, and advised tying the radial artery, which was done, the ligature being applied to the upper end only. When the thread was tightened the pulsation ceased, not only in the tumor, but in the radial and cubital arteries. He then proceeded to dress the wound, but scarcely had this been completed when the circulation being restored in the tumor, it began to beat again, just as before the operation. The radial artery was then tied beneath the aneurismal tumor. The pulsations ceased instantly, and in fifteen days the patient was entirely cured.—*Journ. Hebdomadaire*.

LA CHARITÉ.

Singular affection of the Circulation.

A gardener, æt. 30, was lately admitted under the care of M. Lermnier, who laboured under a periodical affection of the circulating system, consisting of general uneasiness, with pain, all over the thorax, but particularly in the left half of it; soon after this the pulse would become excited, rising to about 134 beats in the minute when felt at the wrist, but in the region of the right carotid artery a pulsation was to be seen which was prodigiously frequent, and is said to have been at least 240 in the minute. This, however, on minute examination, proved to originate in a kind of regurgitation at the root of the jugular, for the carotid could, if sufficient attention was directed to it, be felt pulsating beneath synchronously with the radial artery. During these attacks, which last from 10 to 24 hours, the action of the heart is extremely tumultuous, but not extended over an unusual space. It is fifteen years since the complaint first came on, and it has recurred almost

every month, the health being good in the intervals, and the most careful examination by auscultation leading to the belief that the heart is perfectly free from disease. M. Lermnier tried cold baths and antispasmodics, but without any effect, and the patient left the hospital without relief.—*Lancette Française*.

GUY'S HOSPITAL.

Operation for the Extraction of a Piece of Bougie from the Bladder.

JOHN PERRING, æt. 44, a sailor, of healthy appearance, was admitted into Luke's Ward, July 8th, for the purpose of having a portion of bougie extracted from his bladder. About three months ago he came into the hospital in consequence of a piece of a bougie, which he was in the habit of introducing for himself, having become detached, and remaining behind. Several attempts were made at that time to extract it, with forceps passed into bladder through the urethra, but without avail. A week previous to his last admission the forceps were again tried, and on withdrawing them a quantity of earthy matter adhered to the blades, but the bougie could not be extracted; it was therefore thought advisable to have it removed by performing the operation as for lithotomy. This was done on the 14th, in the usual manner, by Mr. B. Cooper. The straight staff was used, and it was necessary to employ the scoop and two or three varieties of forceps, on account of the awkward situation of the bougie in the bladder, and the friability and extreme softness of the earthy deposit which adhered to it. The patient bore the operation remarkably well, appearing to suffer less than is usual in such cases. About an hour afterwards he was visited, and found to be easy and tolerably comfortable. In the evening also the symptoms were favourable; he was warm with perspiration, and free from thirst.

15th.—Makes no complaint; pulse natural; skin perspiring; tongue coated with a dirty white fur; no thirst; slept well last night.

16th, Morning.—Quite as well as yesterday. No pain except when the water passes through the wound; the uneasiness is then referred to the end of the penis. In every other respect he feels very comfortable. Pulse natural; skin covered with profuse perspiration; no thirst; slept soundly the greater part of the night. Evening: quite cheerful; his bowels not having been opened, he is directed to take castor-oil in the morning.

17th, Morning.—A very good night, but towards morning was not so comfortable. At 7 o'clock had a slight shivering, and

afterwards heat and perspiration. The wound is directed to be fomented. Evening 8 o'clock: had another attack of fever; the cold stage being more severe than that of the morning. Pulse quick and soft. Mr. Callaway, who saw him for Mr. Cooper, directed 25 gtt. Træ. Opii to be taken directly, and to continue the medicine composed of effervescing mixture, camphor julap, and black drop, which was prescribed for him during the day, to allay a frequent hiccup that had made its appearance. The bowels had been well purged by the castor-oil.

18th, Morning.—A very comfortable night, but at 7 o'clock the rigors returned, and subsequently the heat and perspiration. Pulse soft and regular, not very frequent. Hiccup still troublesome; no pain of the abdomen on pressure. At 12 o'clock Mr. Callaway visited him again, and drew off the water through the wound in the perineum; he also removed two pieces of calculous deposition, the size of cherry stones; and he directed a mustard poultice to be applied to the pit of the stomach, and Calomel, gr. i. c. Opii, gr. i. 6ta hora. Evening, 9 o'clock: Hiccup continues unabated; no pain of the abdomen; pulse regular, not frequent; countenance not expressive of much anxiety; has had a slight vomiting of bilious matter. To discontinue the last medicine, and to take in its stead,

Træ Opii, gtt. xv. c. Mist. Salinæ, 3iss
2da hora. Emp. Lyttæ amp. scrob.
cordis.

19th, ten o'clock A.M.—In the early part of the night was very restless, and greatly disturbed by the hiccup, until two o'clock in the morning; from this time until four o'clock he slept well, the diaphragm acting convulsively, but without disturbing him; this, however, now became so violent as to prevent him from enjoying the slightest repose, but he did not complain of pain in the abdomen; pulse 120, soft; tongue more coated and dry, and around the lips and teeth was collected a quantity of dark sordes. His countenance now became expressive of great distress. The blister did not rise; he was so exceedingly restless that it did not long remain on the part to which it was applied. Mr. Callaway visited him two or three times during the day. At four o'clock he was very low, and mustard poultices were then applied to his feet. At eight o'clock these had not taken effect, but the extremities were warm: pulse intermitting. The hiccup had ceased to trouble him; he was sensible when roused, or when spoken to, but at intervals had been delirious. At ten o'clock he died.

Post mortem appearances.—At one o'clock the body was examined. The pluræ of the chest and of the lungs were adherent, but very slightly; the lungs healthy; a small

quantity of lymph was observed between the inferior surface of the lungs and diaphragm. The liver slightly inflamed. Stomach and intestines, externally, not unnaturally vascular; internal coat of the former very loose and flabby, being separated from the middle tunic by the slightest touch. The large intestines contained a small quantity of dark fecal matter, but their internal surface presented no morbid appearances. The kidneys were the only organs importantly diseased—they were very soft, of a lobulated and granulated texture, and mottled aspect, when deprived of the investing membrane, which easily separated from them; the internal surface very pale. The bladder was removed from the pelvis and very carefully examined; on raising it up previous to separating it from the pelvis, Dr. Hodgkin observed a small quantity of pus in the wound; the incision through the prostate into the bladder was as fairly made as could possibly be desired; there was not the slightest attempt at reparation either in the bladder or in the external wound of the perineum. The internal surface of the bladder very healthy; there were one or two dark indurated spots, which seemed to be from former inflammation, perhaps caused by the bougie, or from former attempts to extract it by the forceps.

[Another interesting case of lithotomy has also occurred at this hospital, which we shall give next week]

MEATH HOSPITAL, DUBLIN.

Case of Subclavian Aneurism.

[Continued from page 192.]

THURSDAY, July 16th, seventeenth day since the operation.—The ligature was this morning removed without a drop of blood following it; the wound is perfectly healed, except at the point where the ligature hung out. The patient is quite free from pain, or any uneasy feeling in the chest, the wound, or the arm; the temperature of the latter is equal to that of the other arm, nor has there been any apparent diminution in it since he was operated upon. There is a distinct steady pulsation in the radial artery at the wrist. Synchronous with the action of the heart: upon the eighth day there was a thrilling sensation perceptible in this vessel, which felt full of blood. The day after the operation, a slight flutter occurring at intervals, and almost amounting to an intermission, was perceived in the pulse of the right arm; that, however, has disappeared; no other untoward symptom has manifested itself.

Gentle purgatives and small bleedings have occasionally been used. The aneurismal tumor has almost disappeared. The calibre of the ligature is only large enough to admit a common-sized probe to pass through it.

LADIES' LYING-IN INSTITUTION.

To the Editor of the London Medical Gazette.

SIR,

THE account of the British Ladies' Lying-in Institution caused me immediately to conceive, and had not my phreno-gestation been interrupted professionally, I should have brought forth some days ago. Whether my labour has been a natural one, and the bantling legitimate, or you will consider it a *lusus naturæ*, and refuse to announce its birth, I am all anxiety to know. It is my first-born, Mr. Editor—do not deny it an existence; let it only breathe in your columns, and I will be pregnant again (on some other subject) the first opportunity.

In the language of Earl Grey, "I will stand or fall with the order to which I belong." Allow me to ask what is to be the fall of men-midwives? Are we to be exterminated like the Janizaries, or transformed, as were the Prussian lawyers, by making the tall ones grenadiers and the short ones drummers and fifers? Shall we take the places of those *midwives* who will step into our shoes, or, as a climax, are our bodies to be dissected *alive*, the *vox populi* being inimical to examining *dead ones*.

"Hung be the heavens with black."

I know a lady, Mr. Editor, who proposes to increase the world without our sex. The author of the *Last Man* never dreamt of such a crisis. The lords of the creation to be no longer wanted! What is to become of us, either as *men* or *midwives*, under such proposals, is earnestly enquired by

Yours in hope,

RUSTICUS?

July 16th, 1829.

TEST OF INSANITY—CORRECTION OF AN ERROR.

THE Editor of the Medical Gazette presents his compliments to his brother Editors of the *Quarterly Journal of Science*, the *Medical and Physical*, and the *Medical and Surgical Journals*, and requests that they will take the trouble to correct a mistake in one of the reports of the proceedings at the College of Physicians, which they have respectively done him the honour to copy from the Gazette. In Sir H. Hallford's paper, the words "the will was then executed, being witnessed by the Physicians," ought to have been omitted, as the jet of the illustration consisted in the application of the "test," which prevented the deed from being completed (see Gazette, June 13th, page 59).

The Editor regrets his having fallen into

this mistake the more, as, from all reference to the source whence the report was taken having been *by some accident* omitted in the several Journals alluded to, they may incur the discredit of a blunder to which they have as little title as to the article which contained it.—July 21, 1829.

LITERARY ANNOUNCEMENTS.

MR. SWAN is preparing for publication a *Demonstration of the Nerves of the Human Body*, founded on the subjects of the two Collegial Anatomical Prizes adjudged to him by the Royal College of Surgeons. The First Part, exhibiting the Nerves of the Thoracic Viscera in large Plates, will be ready in January next.

In the press—Illustrations of the Parts concerned in the Lateral Operation of Lithotomy, with a Description of the Mode of performing it. By Edward Stanley, Assistant Surgeon, and Lecturer on Anatomy and Physiology, at St. Bartholomew's Hospital. Royal 4to.

BOOKS RECEIVED FOR REVIEW.

An Experimental Inquiry into the Laws which regulate the Phenomena of Organic and Animal Life. By George Calvert Holland, M.D.

An Essay on the Connexion between the Action of the Heart and Arteries and the Functions of the Nervous System, and particularly its Influence in exciting the Involuntary Act of Respiration. By Joseph Swan.

An Essay on the Phrenology of the Hindoos and Negroes. By James Montgomery, Esq. Together with Strictures thereon, by Corden Thompson, M.D. Lecturer on Physiology, and on the Nature and Treatment of Diseases, at the Sheffield School of Anatomy and Medicine.

NOTICES.

We have received a letter signed "Δ." pointing out some typographical errors in the London Encyclopædia, and certain blunders in Dr. Gordon Smith's "Hints for the Examination of Medical Witnesses." As to the first, we have enough to do to look after our own printer; and with regard to the second, we cannot afford the space it would require.

ERRATA

IN MR. GULLIVER'S PAPERS.

P. 41, for Callison, read Callisen.—P. 43, for spina ventosa, read spina ventosa.—P. 138, for carious, read caseous.—P. 139, for Exostosis, read Exostoses; and dele is before "extremely."

W. WILSON, Printer, 57, Skinner-Street, London.

THE LONDON MEDICAL GAZETTE,

BEING A
WEEKLY JOURNAL

OF

Medicine and the Collateral Sciences.

SATURDAY, AUGUST 1, 1829.

ON THE
INFLAMMATORY AFFECTIONS OF
THE BRAIN AND ITS MEMBRANES :

*Being the Substance of the Croonian Lectures,
delivered before the Royal College of Physicians,
in May 1829,*

BY FRANCIS HAWKINS, M.D.

Physician to the Middlesex Hospital.

[Continued from page 229.]

LECTURE III. *concluded.*

SUCH, then, is the general course of encephalitis through its three periods of inflammation, disorganization, and morbid productions. But the symptoms may be modified according to the seat of the disease. What then are the results obtained from the observations which have been made upon this interesting part of our subject? It is contended by Bouillaud, in an able work upon encephalitis, that four points have been proved by a sufficient number of facts:—

1st, That paralysis of the organs of speech depends upon lesion of the anterior lobes of the brain.

2dly, That paralysis of the inferior limbs is connected with lesion of the middle lobes, or of the corpora striata.

3dly, That paralysis of the upper limbs is the effect of lesion of the optic thalami, or of the posterior lobes of the brain.

4thly, That paralysis of the muscles of the eye, since it is often unaccompanied by that of other muscles, must be produced by the lesion of a distinct part of the brain, the exact situation of which has not yet been ascertained.

To these conclusions is of course to be added the old and well-known obser-

vation, that disease or injury of the cerebrum or medulla oblongata, above the decussation of the anterior pyramids of the spinal marrow, produces paralysis of the limbs on the side opposite to that of the injury of the brain.

With respect to paralysis of the organs of speech—so many cases are recorded, in which this symptom having existed, the subsequent examination has disclosed injury of the anterior lobes of the brain; or when such a morbid appearance has been described, it has been so often found, upon reference to the symptoms, that the patient's speech had been materially affected, that I cannot but think the connexion between the organs of speech and the anterior lobes of the brain is not imaginary. What then, it may be said, becomes of the office of the ninth pair of nerves? It is to be recollected that the power of simply moving the muscles of the tongue is very different from the faculty of pronouncing articulate sounds, of connecting them together, and forming them into words; and that the former may be retained, when the latter is impaired or lost. It is possible, therefore, that the voluntary motion of the tongue may be derived from a different part of the brain, whilst the power of regulating and combining the various movements necessary for the formation of articulate language may reside in the part assigned; namely, the anterior lobes.

In other terms, it may be stated that, in the act of perceiving the relation between ideas or things and the words or signs which stand for them, the anterior lobes of the brain are exercised. Hence it will follow that the same parts must be employed in the *recollection* of words or names; for, whatever change in the

material organ originally precedes a sensation or idea, it is probable that a similar change must be excited when the same ideas are recalled by an act of memory. Hence it is easy to understand why, when the speech is much impaired by palsy, the memory appears to be especially affected. It is the recollection of words which is in these cases lost. This apparent connexion between the memory and the power of utterance was long ago noticed by Dr. Lawrence, in his *Prælections*:—

“*Nervorum resolutionem passis, memoria plerumque non solum minuitur, verum etiam, nunc sensim, nunc derepente, quodammodo evanescit: adeo ut hoc morbo correptos doctissimos nec elementa literarum prima, nec propria nomina tenuisse sæpe compertum sit. Miserrimum sane symptomatis genus; paralytin autem eam, quæ apoplexiam solutam consecuta est, maxime comitatur, et eos præcipue, quibus lingua est resoluta.*”

Although it occasionally happens that the patient can write the words which he cannot articulate, yet is it more frequently observed that all recollection of many words is lost, and one word substituted for another, without the smallest similarity or connexion existing between them. It is not unusual for the memory to be affected in a partial and curious manner; the recollection of a particular language, or of particular words, or classes of words, such as substantives or adjectives, being obliterated. Many curious instances of this partial loss of memory are recited by Dr. Prichard, in his treatise on Nervous Diseases.

Mr. Cates, of Argyll-Street, has obligingly communicated to me the circumstances of a curious case illustrative of our present subject:—

T. B. aged 47, of a bilious complexion, and of studious and sedentary habits, had for several years been occasionally the subject of what was called a nervous headache. This was usually most distressing in the autumn of the year, and was considered to arise from want of air and exercise, and too intense application to business and to books; inducing torpor of the liver, constipation, and great depression of spirits.

In Sept. 1807 he complained of great loss of strength and appetite, accompanied by a dull pain and heaviness in the head. He was cupped on the back of the neck, and took blue pill and saline

aperients, and experienced some relief. But the headache still continuing, he was advised to abstract himself from business, and go into the country. On the 12th Sept. he went to Brighton, and on the third day after his arrival there, on writing to his wife, found, to his great astonishment, that he had misplaced the order of the letters of his name, which induced him to read over his letter, and he found that he had committed the same error in several words. He wrote again, but again was incorrect, in the misplacing of letters, particularly in his own name, though in no instance was there any addition or deficiency of letters to form the word,—they were only misplaced.

This gave him great uneasiness, and he consulted Sir Matthew Tierney, who prescribed cupping, a warm bath, and purgatives. These were repeated on the following day, but without any amendment as to the loss of power of arranging the letters in order. He returned to town after an absence of one week. Mr. Cates recommended him to consult Dr. Baillie, his family physician, who being out of town, Dr. Stone saw him, and considered his case as dependent upon derangement of the stomach and liver. In a fortnight's time Dr. Reynolds was called into consultation, who took a new view of the case, and was of opinion he should be supported by tonics, which were tried for twelve or fifteen days without any abatement of the symptoms. Sir Francis Milman and Sir Lucas Pepys were requested to consult with Dr. Stone and Dr. Reynolds: they paid him one visit, but gave no new opinion.

About the latter end of October Dr. Baillie arrived in town, and met Dr. Reynolds and Dr. Stone in consultation, and immediately pronounced his opinion that there was a tumor in the brain, and thought that the only chance of success depended upon exciting salivation as speedily as possible. But before this could be effected paralysis took place on one side, *with deficient articulation*.

The embarrassment in the speech increased. He daily got worse, and died on the 14th December.

On examination, “the blood-vessels of the brain and its membranes, particularly on its upper surface, were more than usually filled with blood. In the substance of the middle of the lower

part of the left hemisphere of the brain there was a tumor as large as a pigeon's egg. In the whole of this tumor the substance of the brain was much altered from its natural state, and a considerable quantity of matter was formed in it. The lateral ventricles were considerably distended with water, particularly the right ventricle; but the choroid plexus was not so pallid as is usual when water has for a long time been contained in the ventricles."

Certainly the foregoing case sufficiently illustrates what was said, at the commencement of these lectures, of the ambiguity of the early symptoms of cerebral affections.

A tumor, such as was found in this case, might well have affected the anterior lobes of the brain. But whether the forgetfulness of words and letters in this and similar cases, depend upon lesion of those particular parts or not, it is clear that the knowledge of things and the judgment may remain entire when the power of utterance is greatly affected. The signs and gestures by which patients in this situation endeavour to make known their ideas are often highly ingenious and expressive. My attention has lately been called to the case of a patient who has been subject to repeated paralytic seizures, which have caused the left side to be slightly hemiplegic. Her intellect and judgment do not appear to be injured, but her ability to express her thoughts is much impaired. Hence her efforts to converse are singular and painful; continually failing to express the word she wishes, and substituting for it either another word, or an inarticulate sound; she is, nevertheless, conscious of her error, and after many vain attempts to correct it, is forced to give up the task in despair, and to appeal at last to the knowledge of her hearers. I am persuaded that in her case extravasation has occurred in the right anterior lobe; and it is remarkable that cupping at the back of the neck has not appeared to be of any service, whilst leeches on the temples have been decidedly beneficial.

I am aware that the dependence of the faculty of speech and of the memory of words upon the anterior lobes of the brain, has been denied both in this country and in France; and cases have been brought forward to show that the power of utterance may be much impaired when the organic lesion is situated

in some other part of the brain. Many such anomalies may be expected to occur; for much will depend upon the period of the disease, on its activity, on the sensibility of the patient, and upon the degree in which the disease of one part of the brain acts upon another, through pressure, sympathy, or irritation. Still, if in a great majority of instances in which the faculty of speech is impaired or lost, the anterior lobes of the brain are found to be diseased, a strong probability will be raised in favour of the connexion between this faculty and a material organ, such as is here supposed to exist. Probability of this kind appears, I think, to arise from an examination of the cases published in the works upon the diseases of the brain. Other cases of the same nature are frequently added to the annals of medicine. In the Medical Gazette for the first of November in the last year, a striking case was published of loss of speech dependent upon suppuration in the anterior lobes of the brain.

In the case of the Duke of Saxe-Gotha, which was lately the subject of litigation in a court of law, the most remarkable and prominent symptom was a growing disinclination or inability to speak, and a tumor was afterwards found, which pressed upon the anterior lobes of the brain.

With respect to the connexion supposed to exist between the motion of the lower limbs and the middle lobes of the brain, and that of the upper limbs and the posterior lobes, it likewise rests upon probability, drawn from the examination of numerous cases. Opinions to the same effect, concerning the voluntary motions of the limbs, have been maintained by numerous French pathologists, Foville, Pinel, Serres, Saucerotte, and others.

Independent of the cases directly bearing upon this subject, in which disease of the assigned portions of the brain appeared to produce paralysis in the respective limbs, one case is related, apparently confirming the same views, in which a ligature passed round the right subclavian artery, for the cure of aneurism, accidentally included a portion of the brachial plexus of nerves: suppuration was afterwards found to have taken place in the left posterior lobe of the brain.

There are certain parts of the brain the injury of which is said not to pro-

duce paralysis. These are the parts which have no direct communication with the spinal marrow; such as the corpus callosum, fornix, and septum lucidum.

Since the observations which have now been made relate only to the *voluntary* movements of the body, they are not in fact contradictory to the physiological experiments upon animals which have of late been frequently performed, and much insisted upon, for the movements which animals have continued to execute after the removal of the cerebral hemispheres are only *instinctive*.

Difficult as it is to ascertain from pathological observations the source of the voluntary motion of different parts of the body, it is still more so to discover the separate organs of the intellectual functions, if, indeed, the mind be possessed of various organs, which, from its constitution, composed as it is of different faculties, must be allowed to be not improbable. The difficulty in this case is further increased, because if one hemisphere be sound, it is sufficient for the exercise of these faculties; again, because disease of one part or organ sympathetically affects the rest; and, thirdly, because the loss of speech which commonly ensues deprives us of an important part of our means of observation.

Since the brain is composed of two different structures; it is scarcely probable that the same functions should belong to both. And since in the grey matter all the nerves are found to commence or end, it is not unlikely that this part may be destined to receive impressions and originate sensations, whilst the medullary part may be engaged in conveying the power of voluntary motion to all parts of the frame. It is further probable, from the symptoms of arachnitis; from examination of the brains of maniacs; and from other pathological observations, that the faculties which are purely intellectual, employ, as their especial organ, the cortical part or cineritious surface of the hemispheres.

We have noticed the principal observations which have hitherto been made respecting the modification of the symptoms of encephalitis according to the part which is the seat of disease. From the description which has been given in this and the preceding lecture, it is easy to perceive the principal

points of difference between arachnitis and encephalitis; and again between both of these and apoplexy. These distinctions were thus explained by a French physician of the name of Ducrot, in a treatise published in the year 1812:—"In inflammation of the brain there is observed a slow and gradual progress of hemiplegic symptoms, with contraction more or less painful of the paralyzed muscles, idiotic alteration of some of the sensorial and intellectual faculties, stupor of the countenance," &c.

"In sanguine apoplexy the same symptoms occur, but in a sudden and violent manner."

"In arachnitis there is cephalalgia, violent delirium, spasms, agitation, fever more or less intense, and injection of the eyes and countenance."

More recently, Lallemand has summed up the same distinctions concisely, thus:

"In inflammation of the arachnoid, spasmodic symptoms without paralysis."

"In apoplexy, sudden paralysis, without spasmodic symptoms."

"In inflammation of the brain, spasmodic symptoms, slow and progressive paralysis; the course of the disorder being unequal and intermittent."

Bouillaud has stated the same characteristics perhaps still more clearly and correctly.

"In partial inflammation of the brain, spasmodic contraction, succeeded by partial and circumscribed paralysis."

"In apoplexy, paralysis, but without antecedent spasmodic contraction."

"In arachnitis, spasmodic contraction of all the locomotive system, and epileptic seizures, terminated by coma and general paralysis."

It is further to be observed, that encephalitis occurs in a chronic form much more frequently than as an acute disease; and that it is very often complicated with other disorders which greatly confuse and obscure its symptoms.

On the causes which produce inflammation of the brain it is not necessary to dwell at length; they are almost entirely similar to those which have been assigned to arachnitis, although their effect must be determined in each case to a different texture by circumstances which it is difficult to appreciate.

Briefly to recapitulate the exciting

causes which are observed to be in most frequent operation, they are as follows:—1. External injury; 2. nervous irritation propagated to the brain; 3. depressing passions; 4. abuse of spirituous liquors; 5. the presence of foreign bodies, whether from without, or of internal growth, which are capable of compressing or of irritating the brain.

The causes which predispose to the disease may be found perhaps in the sanguine or nervous temperament of the individual. But they do not in fact differ from those which excite the disease, except that they act in a more slow and gradual manner. The same circumstance, according to its degree of energy, is capable of being an exciting or predisposing cause of disease.

The *treatment* proper for encephalitis differs, in some respects, from that which is required in inflammation of the membranes, although both should be of the antiphlogistic kind. But the character of arachnitis requires the practice of such prompt and vigorous depletion as would exhaust the strength of the patient labouring under partial inflammation of the brain, and render him unable to bear up against the slow and insidious attacks of chronic disease. What then is the mode of treatment which is at once most rational, and found to be most efficacious in subduing encephalitis? It is the occasional or periodical abstraction of moderate quantities of blood, which, without destroying the patient's strength, puts a stop to those accessions of irritation that excite the disease, and cuts off the supplies that support those morbid processes to which chronic inflammation essentially tends.

Nor is the same active exhibition of calomel required in this disorder which is necessary to arrest the more rapid progress of arachnitis; but given in smaller and continued doses, and sometimes so as to affect the mouth, it certainly has the power of withstanding chronic inflammation; and, generally, when combined with opium, it appears to subdue, in a wonderful manner, the irritation caused by cerebral disease.

To this plan should, of course, be added the application of cold, and other parts of a soothing and antiphlogistic treatment which the circumstances may require or justify.

Tartar emetic in clysters, as recommended by Desault, or given according

to the method of Rasori, continues to be highly approved on the continent.

In all affections of the brain it is rightly enjoined to attend especially to the state of the urinary discharge; and the use of the catheter must not be neglected, should the bladder become distended through a diminution of nervous sensibility.

Other precautions which are proper during the progress of the disorder, or state of convalescence, are the same as have already been recommended in cases of inflammation of the membranes of the brain.

If the distinctions which have been drawn in this and the preceding lectures between inflammation of the brain and that of its membranes; and again, between the symptoms of arachnitis, according as that portion of the membrane which is spread over the convexity of the brain, or that which covers the base, is the seat of disease; and further, between the symptoms of inflammation of the brain itself, according to the period of the disease, and the situation of the part affected,—if these and similar distinctions should be thought to be needless refinements, it is to be recollected that only by classifying the symptoms of inflammatory affections of the brain, can we hope to distinguish those which are essential to these affections, from such as, being accidentally combined with them, create that obscurity which it is desired to remove. If the diagnosis of these disorders were clearly marked and sufficiently established, I am persuaded that practical good would follow; were it only from applying measures of active depletion to the treatment of membranous inflammation, and from treating primary inflammation of the substance of the brain with the repeated abstraction of moderate quantities of blood.

ABSTRACT OF A CLINICAL LECTURE
ON

UNUNITED FRACTURES,

*Delivered at Guy's Hospital, July 22, 1829,
By C. A. KEY, Esq.*

HARRIETT DAVIS, æt. 13, admitted July 13, with an ununited fracture of the tibia and fibula. The account she gives of the accident is, that in stepping from one stair to another, her foot slipped, and she found her leg broken.

At the time of the accident she expressed her surprise that the fracture had been produced by so slight a cause. She states that her limb had been weak from birth, and that, from some imperfection in the bone, the leg had been, as long as she could remember, bowed forward. Immediately after the accident she was taken to a hospital, and remained there for several months, but without any amendment of the limb. The bones are broken about two-thirds down the leg, and a joint appears to have been formed between the ends of the bone, allowing motion in a circular direction to some extent; flexion and extension are limited to about an angle of 90 to 100 degrees. The gastrocnemius tendon is contracted, and forms the impediment to extending the leg in a straight line. She can place her toe on the ground, but is unable to bear upon it. She expresses a wish to undergo any operation likely to render her leg useful, or even amputation should it be required. On Tuesday the 21st Sir Astley Cooper saw her, and concurred with Mr. Key in the propriety of attempting to remove with the saw a sufficient portion of bone to enable the leg to be perfectly extended, and then to unite the ends of the bone as in a compound fracture. The state of the fibula, it was thought, would form no obstacle to the attempt, as the union of the tibia would enable her to bear upon the leg, while the fibula would still in its imperfect state form a point of attachment for muscles. An incision was made in a straight line upon the tibia for about two inches and a half, and the ends of the bone, after some dissection, laid bare. The muscles adhered closely to the periosteum, and were with some difficulty separated from it; they appeared white, and resembled ligament more than muscular fibre. The edges of the bone were united by a ligamentous structure, as were also some points of their surface; these were separated by the knife. About three-quarters of an inch of the lower portion were sawn off, and removed by the bone nippers, and rather less of the upper portion. An attempt was then made to extend the leg, but it did not succeed; and it was evident that a considerable piece more of the tibia must be removed before the tendo Achillis would permit the leg to be straightened. The girl had borne the operation hitherto with

fortitude; it was necessarily tedious, and occasionally appeared to give her exquisite pain, especially when the sides of the tibia or the muscle were compressed. A doubt now arose whether it would be advisable to remove more bone, or to amputate the leg below the knee. A large piece of bone would be required to be sawn off, and this operation would necessarily leave a large cavity, extremely sensitive, and affording a large surface for future suppuration: from the irritability of her constitution, Mr. K. thought that she would be unable to support the severity of the operation and its consequences, and therefore determined to propose amputation to her, as being the only proceeding that could be adopted with safety. The leg was removed by the usual circular operation.

The subject of ununited fracture may seem to be one of too rare occurrence to form a sufficiently interesting topic for a clinical lecture; but unfortunately we find in practice too many cases of fracture where either union is rendered by circumstances very tardy, or in which the attempt to unite the bone by osseous matter altogether fails. The causes of this failure, the circumstances under which it occurs, the means best adapted to prevent it, and the treatment when non-union takes place, I think are subjects well worthy of your attention.

When a fracture is slow to unite, or after two or three months' confinement still seems indisposed to bony union, we are naturally inclined to throw the fault from our own shoulders, and to impute it to some defect in the patient's constitution. We should, however, pause before we hastily condemn nature, while the cause of failure perhaps rests with ourselves; we should inquire how far our mechanical treatment has fulfilled the objects we have had in view, and ascertain whether the defect is not to be imputed rather to our own want of skill, than to nature's want of power.

From what I have observed in the several cases of defective union that have fallen under my observation, I am disposed to attribute much of the failure to some defect in our treatment—not but that we occasionally meet with cases of defective union in which the whole cause entirely depends on some obvious constitutional weakness; where we, however, have one case arising from

the latter cause, we find many depending upon the ill adaptation of our mechanical contrivances; and the distinction is important, for in the one case the means of preventing and of remedying the evil are within our power; while, by imputing the want of union to constitutional defect, we are blinded to the real cause, and prevented adopting the surest, and, I might almost say, the only means of preventing its occurrence.

When we look at the history of recorded cases of non-union, we find many of them to be fractures of the humerus, some few of the thigh, and more rarely of the bones of the leg and fore-arm. The comparative frequency of the *os humeri* remaining ununited, in my opinion undoubtedly arises from want of due application of the usual apparatus required for fractures. There is no bone which, when fractured, receives so little benefit from the adjustment of splints as the *os humeri*, especially if the fracture is above the middle of the bone. Pressure not being easily made upon the humerus by means of the splint and bandage, the broken ends of the bone are not kept in firm apposition, and the elbow being allowed to move, the *brachialis internus* muscle necessarily draws down the lower portion of the bone, and prevents that state of rest and of pressure so essential to the speedy union of a fractured bone. In my own practice, most of the cases of tardy union that have occurred have been of the humerus: one case you have recently seen in Accident Ward, in which ten weeks elapsed before bony union took place; and another case of a similar kind was, about two years since, in Luke's Ward: in this, sixteen weeks were required before the bone was firm. Yet in these instances I could not attribute the slow progress of the cases to any defect in constitution, but solely to the insufficiency of the means employed to retain the bone in apposition, and to the movements of the elbow joint acting upon the broken surfaces. The necessity of closely attending to these cases I am induced frequently to impress upon my dressers, who are too apt to regard them as accidents of minor importance, that will do well without much care or skill on their parts. The circumstance of this bone being so often the seat of tardy union, and even of a false joint, from fracture, proves that the most

usual cause of these untoward results is to be looked for, not in any defect of nature, but in the improper management of the limb during the period within which union is generally found to take place. If you inquire into the history of cases of non-union, you will detect some fault or omission in the mechanical contrivance employed.

Cases, however, of constitutional defect sometimes are met with in which the union is retarded for several months; and the circumstances attending the accident will be found to be peculiar. The same cause that retards the union of the bone also renders it liable to break from very slight causes, and a reference to the nature of the accident in these cases will usually show that the fracture has been occasioned by causes quite inadequate to the fracture of a healthy bone. The following cases will illustrate this position, and will go to prove that some morbid condition of the bone both leads to the fracture as well as to the slow union of its extremities.

A healthy man was admitted into Luke's ward last March twelvemonth with a fractured tibia, in consequence of striking his toe against a stone as he was walking; the force, though sufficient to break his leg, did not make him fall. The leg was well adjusted by my dresser, Mr. Hughes, and every precaution taken to secure the limb during its treatment; but, notwithstanding the means employed, we did not succeed in obtaining union of the bone for seven months. At the expiration of the eighth month he could walk firmly upon it.

A woman is now in Chapel ward, æt. 60, who met with a similar accident from nearly as slight a cause. She described her accident to arise from a woman running up against her, but not with sufficient force to knock her down; she could feel her bone snap like glass, and found herself unable to walk. Great pains have been taken with her leg, and every measure likely to keep the bone steady resorted to. Union of the tibia has not been obtained under five months.

In the person of a man lately in Accident ward, with fractured thigh, we have had an illustration of the same circumstance. The thigh was broken by his falling down with one leg across the other—an accident certainly not likely to fracture a sound femur. His limb

was kept confined for seven weeks, and when examined the bone was found to have united, but not firmly, as it was unable to bear the weight of his limb. He was cautioned to use it with care; but on the day on which I examined it, he got out of his bed to have it made, and sat upon a chair without supporting his thigh: on being examined on the following Wednesday, his thigh was found to have given way at the same place.

I saw lately, under the care of my friend, Mr. W. Wickham, in the Winchester Hospital, a child whose femur had been fractured six weeks without any signs of union. The occasion of the accident was such as might be expected: the child, who had for some time laboured under great debility and a chronic abscess, broke its thigh while turning about in bed. A great length of time will in all probability be required for its complete union.

It is right in all cases of fracture to know the nature of the injury that has produced it, as we can more justly estimate the time required for restoration of the limb; and in fractures arising from slight causes, we are thus led to extend the time of confinement beyond the period commonly required for these accidents. Our especial care should also be directed to placing the limb in one fixed position, and keeping it steady by all the means in our power for the first four or five weeks. By want of due care during the early period of these fractures, we render the case still more difficult to manage, and the bone more indisposed to unite. The means necessary to obtain this end, I need hardly remind you, are a close approximation of the ends of the bone; steady pressure to keep them in apposition; and such mechanical contrivance as may be required to keep them steady, and to prevent motion. The excuse that is sometimes made for non-union is, the intervention of a piece of muscle between the ends of the bone: it is the duty of the surgeon when he examines into the nature of the accident, and places the limb in splints, to ascertain that the fractured ends grate together: if muscle is interposed, extension should be made, in order to disengage the broken extremity. It is to the want of due examination of the fracture that such an impediment to union is allowed to exist; at the same time it must be confessed

that all attempts to disengage the bone from the muscle will occasionally fail.

There is some analogy between the above cases of fracture arising from slight causes, and fractured cervix femoris in elderly persons, who meet with the accident either from tripping over the carpet, or some such trivial cause. In this accident the same distinction is to be drawn between the cases produced by a slight degree of violence, and those which have been caused by a greater degree of force. The former are found to be connected with a morbid condition of bone, the result of age; and perhaps one reason that so many specimens of ununited fractures of the neck of the thigh bone are to be met with may be, that sufficient time may not have been allowed for the ossific process to take place, as in fractures of other bones under the same circumstances. In saying this, I by no means dissent from the opinions laid down by Sir A. Cooper as to the cause of non-union in fractured cervix femoris, and the treatment best adapted to it. I uniformly regulate my practice by the nature of the accident and the constitution of my patient: if the former be produced by a very slight accident, indicating an unsound condition of bone, and the latter seems much enfeebled by age, and unable to bear the effects of long confinement, I abandon all attempts to procure bony union. I have no wish to rank among those who first misrepresent (some unintentionally) his positions, and then proceed to refute their own statement of his opinions. I feel satisfied that time will confirm his pathological views, and the principle of his treatment.

In the case before us, the accident was produced by merely slipping from one stair to another; and the difficulty in obtaining union would, therefore, be considerable. In the remarks which I have made, I have not the least intention to impute any blame to the surgeon under whom she has been; his high character is sufficient guarantee that every thing has been done to produce union. The original curved form of the leg has certainly been most unfavourable for the employment of pressure; and may have counteracted the means employed; at all events it must have added greatly to the difficulty of managing the limb.

The treatment required for bones that

have failed to unite, consists of one of three plans: first, the employment of pressure by means of a large pad with buckles and straps, to keep the ends of the bones in apposition and the limb steady; in short, in having recourse to those measures, an attention to which, in the first instance, might have produced firm union; for, when bones can be made to unite by this plan, it almost amounts to a confession that, in most cases, they would have united earlier, had the ends been kept in steady apposition. The employment of a seton, carried between the ends of the bone, puts them in the condition of a recent compound fracture; it excites inflammation, suppuration follows, granulations arise from the ends of the bone and inosculate; and if the limb be kept steady, the granulations form the nidus for bone. Neither of these modes of treatment, in this case, could have fulfilled the object which I had in view—namely, to give my patient a straight as well as firm limb. The only plan left for me was to remove as much of the ends of the bone by the saw as would enable me to place the limb in a straight position. The operation performed with this intention I need not describe. The points worthy of notice are, the change which the muscular fibre had undergone in appearance, and its close adhesion to the bone, so that a distinction could hardly be traced between the periosteum and the muscle, and the pain the girl complained of when the periosteum and muscle were pressed. The latter circumstance, in addition to others, impressed me with the idea that she possessed great constitutional irritability, and would suffer much from the consequences of the operation.

I am desirous that you should clearly understand the reason why the attempt to saw off sufficient bone to straighten the limb, as originally proposed, was abandoned; and also how completely the subsequent examination of the amputated limb justified me in the step which I took.

Having, previously to the operation, carefully examined and measured the limb, I was induced to think that sawing off about an inch, or rather more, of bone, would be enough to remove the tense state of the gastrocnemius tendon. The limb, however, was found to have gained but little, after an inch and a half had been sawn off; and it was evi-

dent that, to render the leg perfectly straight, nearly two inches more must have been taken away.

It now became a question how far it would be prudent to pursue the operation further. The removal of an additional portion of bone must have exposed an extensive surface for suppuration; the irritation attendant upon this process must have been excessive, and from the tendency of her constitution it appeared to me to be an operation too severe in its consequences for her to submit to. The danger usually attending operations for the removal of deformities (for such this might be considered), did not escape my recollection. It is a matter of experience which you should bear in mind, that no persons bear operations worse, or suffer more irritation, than those who undergo amputation of deformed limbs. This principle I have often heard Sir Astley Cooper inculcate in his lectures, and have frequently seen it realized in practice when I was dresser. Whether it arises from the operation being performed at a time when the patient was in the enjoyment of full health, and had not undergone previous preparation by medicine and diet, or whether persons afflicted with deformity usually possess a highly irritable temperament, it is difficult to say; perhaps both these causes act in producing the consequent excitement. The truth, however, of the observation I have so frequently seen demonstrated, that I was induced to pause, and to propose amputation as a mode of relief less dangerous in its effects than the removal of so extensive a portion of bone.

The examination of the state of the bones fully justified the removal of the limb. Though in the operation the gastrocnemii had been divided, the tendon remained nearly as much fixed as before, and the limb resisted all attempts to straighten it. I then endeavoured to ascertain how much bone must have been removed for the purpose; but when sufficient bone had been sawn off to allow the tibia to be perfectly straightened, it was found that the ends of the bones were prevented being brought in apposition by the fibula. This bone was found, like the tibia, to have united by ligament, and, retaining its usual length when the limb was straightened, prevented the ends of the shortened tibia from meet-

ing. To have brought the sawn ends of the tibia together, a portion of the fibula must have been also removed, either by extending the incision or making a separate opening to expose the bone; an operation which the hardest constitution could scarcely have recovered from with a useful limb. In having amputated the limb, I feel, therefore, that the wisest course has been adopted, as regards the welfare of my patient; and though the operation has been severe, she has had but little fever, and is doing well.

OBSERVATIONS
ON THE
NATURE, CAUSE, AND TREATMENT
OF HAY ASTHMA.

By WILLIAM GORDON, Surgeon,

Member of the Royal College of Surgeons, Edinburgh, &c. &c. &c.

(*For the London Medical Gazette.*)

THE variety of asthma which forms the subject of the present memoir, has scarcely, if at all, been glanced at by any systematic writer on the practice of medicine. We are furnished with various instances of dyspnœa, and other pulmonary affections, being produced by the inhalation of the effluvia arising from certain odoriferous and other substances, examples of which I myself have witnessed; but the catarrhal and asthmatic symptoms, occurring in particular individuals during the ripening of grass, and evidently caused by the smell given off from its flowers, have been but slightly noticed, and by some practitioners their existence is considered very questionable, if it be not altogether denied. There can be no doubt, however, that the complaint which is termed (though perhaps not very correctly) "hay asthma," does really exist; and although occasionally mild in its nature, yet for the most part it assumes a very formidable character, as will appear from the following history of it, which is taken from some well-marked cases that have fallen under my observation.

The disease first commences with a slight sensation of chilliness, accompanied with thirst, lassitude, drowsiness, and other indications of fever; at the same time the Schneiderian membrane becomes dry and irritable, and the

patient is affected with an almost incessant sneezing, and an inexpressible itching or pricking in the fauces and trachea, and along the external auditory passage; the head is occasionally vertiginous or painful, but more generally it feels heavy or indescribably uncomfortable. These symptoms are soon succeeded by inflammation of the tunica conjunctiva, which comes on very suddenly, and after remaining for an uncertain length of time, vanishes as suddenly as it made its appearance.

After the lapse of two or three days, though sometimes much earlier, a tightness is felt about the chest, and the respiration begins to be obstructed, especially in the evenings, and is then always attended with a wheezing noise. This obstruction at first is but very trifling, and occasions little or no inconvenience; but it daily becomes more and more oppressive, and at length arrives at the very acmé of severity. At this crisis a dreadful sense of suffocation comes on, together with an intolerable weight at the lower part of the sternum, and a deep, hard, dry, frequent cough, which tends very much to aggravate the difficulty of breathing. The condition of the patient is now most distressing—he cannot for a moment remain in the horizontal position, he gasps for breath, his eyes protrude, his face and lips are of a deep purple colour, he throws open the doors and windows, rushes from one room to another in quest of a refreshing current of air, but, unable to find relief, he sinks down exhausted or half insensible. From this state he is roused by stimulants, or he gradually recovers by himself; but probably only to undergo a repetition of his sufferings. These symptoms, which usually make their attack about seven in the evening, but not unfrequently long before this period, continue five or six hours; they then begin to subside, and as the morning approaches, the patient falls into a short but restless slumber, from which he awakes with a sense of great debility, and a feeling of constriction across the chest.

Although there commonly takes place towards the morning a considerable remission of the asthmatic fit, yet the symptoms never quite go off, but remain in a greater or less degree throughout the night and following day, and in the evening assume their accustomed

severity. During the paroxysms the pulse is weak and irregular, and ranges between 85 and 100; the tongue is white, and the urine is high-coloured, and discharged in small quantities.

The paroxysms do not always present themselves in so violent a form as I have now described; the patient sometimes experiences nothing of that overwhelming dread of suffocation which I have mentioned above, and in some instances the attack is so remarkably mild, that he is affected only with sneezing, head-ache, and inflammation of the conjunctive and Schneiderian membranes.

The cough is never attended with any expectoration, and very often it does not come on until the other symptoms have in a great measure abated. In the latter case it is never so frequent nor distressing as when it appears in the earlier stages of the disease.

Hay asthma seems to be peculiar to youth and middle age, and is never observed in the later periods of life.

Many examples, as I before intimated, have been recorded of great distress and disorder of the respiratory organs being occasioned by the odour exhaled from aromatic or pungent bodies; and there can be no doubt that the cause of the singular complaint which I have endeavoured to describe is the aroma emitted from the flowers of grass, particularly from those of the *anthoxanthum odoratum*, or sweet-scented vernal grass. If the patient remain closely shut up in a house, even although this be situate in the midst of the richest grass, he suffers considerably less than if he walk abroad into the fields; and if he remove from the country to the centre of a large town, or go out to sea, he is never at all affected; but the moment he comes into, or approaches a meadow, he immediately begins to sneeze, and returns home with inflamed eyes, wheezing, and difficult respiration. I have known a patient wander about his flower garden for several hours, or ride through corn-fields or plantations, and yet not experience one disagreeable sensation; but as soon as he arrived at the vicinity of a meadow, the sneezing and ophthalmia have instantly appeared. I have said that the *anthoxanthum odoratum* seemed to be the principal exciting cause of hay asthma, and I am induced to come to this conclusion—first, because this plant is one of the most

strong-scented of the grasses; and secondly, because as soon as it begins to flower, and *not till then*, the asthma commences; as the flowers arrive at perfection, the disease increases; and after they have died away, I have remarked that patients could pass through the most luxuriant meadow with total impunity. The disease then should rather be denominated grass asthma than hay asthma, since hay seems incapable of producing it. This asthma appears, from the scanty excretion of mucus from the lungs which attends it, to consist chiefly in a spasmodic constriction of the bronchial vessels, and of the muscles concerned in respiration.

It will be evident, that residing in a large town, or a voyage at sea, during the season in which the flowers of grass, and especially of the *anthoxanthum odoratum*, are in bloom, and in a state of their greatest vigour, will prevent the accession of hay-asthma. But these remedies are not always convenient, nor feasible. It therefore becomes necessary to invent some other means of administering relief, and such as may be at the command of every one. I shall, therefore, give an account of what measures I have adopted, and have found most successful, not only in mitigating or removing the paroxysms when present, but in warding off their attack altogether.

Regarding spasm as the proximate cause of the disease, I exhibited, in the first cases which came under my notice, the powder of ipecacuan and the tartrate of antimony, (sometimes in combination with camphor and extract of hyosciamus), in such doses as to create a constant nausea; which, by its antispasmodic effect, never failed to afford considerable relief. Nausea, however, is too unpleasant and depressing a sensation to be long endured; and in some idiosyncracies it cannot be in the least produced without leading to constant vomiting, or efforts to vomit, which only serve to augment the head-ache and general distress. Finding that nauseating medicines were but of limited application, I made trial of the hydrocyanic acid, in doses of half a drop, or a drop, every two or three hours; giving, in the intervals, from three to five grains of the carbonate of ammonia, with a quarter or half a grain of powder of ipecacuan. This plan invariably alleviated the symptoms; and when they

were not exceedingly violent, removed them entirely. Sometimes I administered the carbonate of ammonia, with ipecacuan, alone, and certainly never without greatly facilitating the difficulty of breathing.

No medicine, however, which was had recourse to, was of such utility, and so speedily and effectually removed the paroxysms, as the ethereal tincture of the *Lobelia inflata*. It was given in doses of one drachm, repeated every three or four hours. The obstructed respiration was always rendered more free by the first dose, and after the second it became perfectly easy and natural; and to this soon followed the disappearance of all the other symptoms.

During the continuance of the asthma the patient should confine himself to the house as much as possible; and should eat biscuit, and the more digestible kinds of animal food. He should sedulously abstain from all spirituous and fermented liquors, and use only coffee for drink. He should also abstain from fresh vegetables and fruit of every description; because these, by readily entering into the acetous fermentation, generate within the stomach an abundance of gaseous matter, whereby this organ becomes distended, and respiration of course greatly impeded.

Care should also be taken to obtain a daily and free evacuation of the bowels by the exhibition of one or two drachms of the sulphate of magnesia every morning. Purging is improper. Diuretics, likewise, should be given, in order to preserve a plentiful secretion from the kidneys; for I have often noticed that whenever the urinary discharge was copious, the fits were generally less severe than when this discharge was scanty.

As soon as the inflammation of the eyes and irritability of the mucous lining of the nostrils supervenes, it should be subdued by keeping a piece of fine linen, wetted with an evaporating lotion, constantly applied to the forehead and across the nose. If this measure be not persevered in, the bronchiæ will become affected by the spreading of the morbid action, and the asthmatic symptoms will soon make their appearance. But if the ophthalmia and irritable state of the schneiderian membrane be timely reduced, the paroxysm will be postponed, and often entirely averted; and

if it should come on, it will be not only milder, but shorter in its duration.

Opium I found to be decidedly injurious. It increased the fever, headache, wheezing, and suffocative tightness across the chest. Vegetable acids were given, but without success; and blisters and tartar emetic ointment were of no utility; nor was any material diminution of the symptoms ever observed to succeed the inhalation of steam or the abstraction of blood by leeches, which were occasionally applied to the chest.

The warm bath was not of the least service, but immersion of the feet in hot water generally proved beneficial. Hay-asthma, like every other variety of asthma, depends upon a state of general or local debility; and, as far as my experience extends, its best prophylactic is the cold shower-bath, which, by its tonic properties, removes that weak and irritable condition which forms the foundation of the disease. This preventive, where it has received a fair trial, has succeeded most completely. It should be commenced with about six or eight weeks previous to the expected recurrence of the complaint; and employed every morning, without intermission, until the hay is being gathered in. Its effects are speedy and most agreeable. If the patient feel any obstruction in the nostrils, heaviness of the head, tenderness of the eyes, tingling in the throat, or impediment of respiration, which he not unfrequently does when he first awakes in the morning, he no sooner uses the cold shower-bath than all these threatening symptoms disappear, and he feels light, vigorous, and active, and can breathe with the most perfect ease and freedom.

During the employment of the bath, the alvine canal should be gently and regularly acted upon by means of saline aperients; and if any thoracic uneasiness be experienced during the day, a dose of the ethereal tincture of the lobelia inflata must immediately be had recourse to.

If the cough continue after the other symptoms have terminated, it is best relieved by opiates, by stimulating embrocations rubbed upon the chest and along the spine, and by change of air.

From what I have witnessed, then, I am disposed to conclude that the cold shower-bath, used in the manner and

with the precautions I have laid down, will prevent the access of hay-asthma; and that the asthmatic fit will at all times yield either to the hydrocyanic acid or to the ethereal tincture of the lobelia inflata.

W elton, South-Cave,
July 18th, 1829.

CASE OF A
TUMOR OF THE RADIAL OR SPIRAL
NERVE OF THE RIGHT ARM;

REMOVED

BY HARRY LEEKE GIBBS, M.D.

Member of the Royal College of Surgeons of
London.

(For the London Medical Gazette.)

PHILIP CHILAIIEFF, æt. 42, a sailor of a robust make and plethoric habit, was admitted into the General Naval Hospital of St. Petersburg, on the 24th of December, 1828. He stated, that, about fifteen years ago, he received a blow with a handspike on the outside of the right arm; that the pain at the time was severe, and followed by a numbness down the back of the forearm to the back of the hand and fingers, which morbid sensations did not completely subside till some months had elapsed. Half a year from the infliction of the injury, he first perceived a moveable subcutaneous swelling, the size of a kidney-bean, about four inches above the elbow-joint, and just below the insertion of the deltoid muscle; painful to the touch, and accompanied by lancinating pains in the course of the branches of the radial nerve on being pressed. These symptoms were increased by violent exercise, or changes of the weather. For twelve years and a half the tumor remained stationary and painless, when, two years back (from long continued hard labour, as he supposes), the swelling gradually increased, and there was a recurrence of the lancinating pains down the forearm. At his admission into the Naval Hospital, I discovered a prominent tumor, the size of a small hen's egg, tolerably moveable, but connected with a cord both above and below; very slightly compressible, highly painful on being handled, and attended by an increase of the symptoms before mentioned. As the patient appeared anxious and excited, I ordered

him to be bled ad ℥xviij. and a smart cathartic to be given. He was put on a very spare diet, and the bowels kept in a lax state.

Jan. 3d, 1829.—The arm being laid on a table, I made an incision of five inches, extending from the lower part of the deltoid to within an inch of the outer condyle of the os brachii. On dissecting back the integuments, the tumor, of a bluish white colour, was brought into view. I found it occupying the fossa formed by the insertion of the deltoid muscle above, the triceps extensor cubiti behind, the origin of the supinator radii longus below, and the brachiiæus externus within. Under the outer portion of the latter muscle, part of the tumor had embedded and attached itself, so that it became necessary to remove it. Having separated the tumor from its lateral attachments, I divided the nerve three quarters of an inch below it. The man instantly exclaimed that he had lost the power of raising his fingers, and of want of feeling in the outer part of the forearm and back of the hand. The dissection underneath was now easy, and I was happy to find that my fears of an adhesion to the periosteum were groundless. I lastly cut through the nerve at the like distance above the tumor, just as it emerged from beneath the bone. This was attended with pain, and as the artery accompanying the nerve bled freely, a ligature was applied. This vessel seemed dilated, and to be the arteria nutriens of the tumor. The wound was brought together by strips of adhesive plaster, over which graduated compresses and a circular bandage were applied. The limb was placed on a pillow in a relaxed position, the forearm and hand enveloped in flannel, and a bottle of warm water ordered to be constantly applied to the fingers.

Jan. 4th, second day.—Passed but a restless night, notwithstanding the administration of two grains of opium yesterday evening. Complains of oppression under the sternum, and a sense of constriction across the lower part of the chest and præcordia; also of pains shooting up the right side of the neck, in the course of the cervical nerves forming the brachial plexus. As the patient appeared agitated, and the pulse rising, V. S. instant, ad lbij. largo orificio, was ordered, and an active purge prescribed. By the evening co-

pious evacuations had taken place, and he was composed.

Third day.—Slept tolerably. Pain more concentrated to the left side of the thorax and right hypochondrium. An ample blister was applied over these parts.

Fourth day.—Much better. The strictest antiphlogistic plan followed, and the bowels kept well open by a saline mixture with sulphas magnesiae.

Fifth day.—About half the wound found healed by the first intention. He now complains chiefly of an acute pain at the extremity of the right thumb-nail, especially on its being touched. Has no feeling on the radial and outer side of the forearm, back of the thumb, and those fingers supplied by the dorsal branch of the radial nerve. It is curious that a well-defined limit exists, extending as far as the middle of the ring finger; for the inside of this, and the whole of the little finger supplied by the ulnar nerve, are sensible on being pinched.

Sixth day.—Wound suppurating freely at the lower part.

Ninth day.—The ligature came away. The wound filling up by granulations at the lower part. The patient sat up for a few hours.

Twelfth day.—From this period nothing occurred to interrupt the cure of the wound, save an infiltration of matter under the integuments towards the lower and outer side of the arm. This sinus being laid open, a free and depending aperture was afforded.

On the twenty-ninth day the patient was walking about, his arm supported in a sling, and his wound healed.

Thirty-fifth day.—Has regained a slight use of the extensor muscles of the fingers, the numbness and want of feeling gradually disappearing. Electricity in the course of the brachial nerves, and stimulating frictions, are now daily employed, and motion given to all parts of the limb.

On the 16th April the patient was dismissed the hospital, with returning sensation in the back of the hand and a tolerably free use of the arm. How far the other nerves supplying the forearm and hand may contribute, by anastomosis, as it were, in restoring the perfect use of those parts divested of the influence of the radial nerve, time must prove. Already something of the sort seems to have commenced, and my

expectations are the more sanguine, as, to the present date (June 2d, 1829), the man has not returned to the naval hospital.

The tumor, on examination, was found to consist externally of the thickened neurilem extending from the nerve above the tumor, as a capsule, to the nerve below. This general tunic was of a lamellated structure, as viewed by the microscope, dense and inelastic, and of the colour of the tunica albuginea of the testis. Under this the nervous fasciculi appeared, diverging with and intersecting each other, like a network, to the thickness of half an inch. The rest of the mass consisted, internally, of a pulpy, striated, greenish black matter, the striæ running from the circumference towards the centre, and surrounding minute interstitial cells, filled with a similar medullary pulp, or jelly. A small portion of coagulated blood was very distinct on one side, in the firmer substance of the tumor. The centre was occupied by half a teaspoonful of highly fetid coffee-coloured sanies. Condensed cellular membrane surrounded the whole of the tumor, which, at the inner and lower part, was firmly adherent to that part of the brachialis externus removed during the operation. The tumor was an oval of two inches and a half in the long diameter, by nearly two inches across. This, with the portions of nerve divided above and below, brought the whole length of the extirpated part to four inches.

Observations.—That the blow received on the arm fifteen years ago was the primary cause of the chronic inflammation set up in the radial nerve (first, most probably, in its neurilematic theca, or capsule), there is little doubt; but that it should have once commenced and then have lain dormant for the space of nearly thirteen years, is remarkable. This vis reproductiva I have had occasion to observe, not unfrequently, both in the mammae and testes, arising either from a blow, the action of cold, or some peculiarity of the system at the time. The epididymis I have found to be the most speedily affected by this sudden change, particularly in dram-drinkers and in those addicted to excess of venery. In these cases, it appears to me that the sooner an operation is had recourse to the better.

The preparation of this rare and in-

interesting tumor I have presented to the Hunterian Museum, belonging to the Royal College of Surgeons of London.

St. Petersburg, June 2, 1829.

[We beg to offer our best acknowledgments to our distinguished countryman for the above interesting paper, and we hope to be favoured with the farther results of his experience: it is obvious that distance has not lessened his interest in the cause of science in this country.]

ACCOUNT OF THE PLAGUE.—EFFICACY OF STIMULANTS.

BY R. R. MADDEN, Esq.
M. R. C. S.

[Concluded from p. 245.]

It was only in Candia I had reason to alter my opinion about Dr. M'Cleane's doctrines. I was there thoroughly persuaded that plague is both *contagious and infectious*—at one period *epidemic*, at another *endemic*. In plain English, that the miasma may be communicated by the touch or by the breath; that at one period it is confined to a particular district, and at another is disseminated amongst the people. But if plague have one form more decided than another, it is the endemic. I survived the folly of inhaling the infected atmosphere of plague chambers, sitting on the bedside of pestilential people, as I was in the habit of doing at Constantinople, and feeling their ill-conditioned sores. In Candia, I say "the fell serjeant" was too often at my elbow to let me sleep in the sweet security of non-contagion. The effluvia of pestilence has been too near my nostrils to continue to court approximation for the sake of supporting a system.

In Candia I passed many nights in a chamber where a mat was the only separation between my bed and that of a man dying of the plague. I was not aware of his disease, nor, indeed, was any one of my companions, till I was requested to examine him a few hours before his death. Yet no one was infected, and I could only account for the extraordinary exemption by presuming that the great quantities of ardent spirits which these gentlemen (who were the officers of Ibrahim Pacha) were in the habit of taking, morning, noon, and night, had put them in that state of body which is the least susceptible of plague miasma. I am speaking from my experience, and suffer myself not

to hazard a conjecture in the present letter.

The disease which plague most resembles is the gaol fever of this country*, bad typhus fever, and in contradistinction to *typhus gravior*, or putrid fever. I have given plague the name of *typhus gravissimus*. The symptoms from the first are general debility, congestion about the heart, not depending on inflammation, but on the putrescent state of the circulation. It differs little from putrid typhus, except in its duration and eruptions. In every stage of plague, nature appears to lie prostrate under the influence of the poisonous miasma; and when the patient sinks at last, it is from the want of force in the constitution to drive out the eruptions on the surface. The bubo recedes, or the carbuncle diminishes, or neither appears at all externally; but they have seized on the internal vital organs, and the immediate cause of death has been shown by dissection to have been carbuncles on the liver, lungs, spleen, or mesenteric glands; in short, it appears that the whole glandular system is the seat of the disease. I have seen all the different species of plague enumerated by Russel and the French authors, and I have no hesitation in pronouncing all these different species of plague to be the symptoms of *one class* only; and I assert there is but one indication to fulfil, namely, to assist nature to expel the poison by strengthening the exhausted powers of the constitution, and enabling it to throw out the morbid matter. By what means is this to be done—whether by emetics, by purgatives, by bleeding†, by calomel, by mercurial unction, or by oil friction? There is none of these means I have not tried, and out of the first eleven patients so treated I lost nine. I had recourse to another mode of cure: I certainly did not see it employed by any other person, and although the propriety of adopting it has been glanced at by Assaline, it never was carried into

* I am happy to say I have Dr. Babington's opinion to the same effect. In a conversation I had with that eminent physician, he coincided perfectly in my ideas respecting the nature of plague.

† Dr. Russel, of Aleppo, was one of those who went on bleeding from the beginning to the end of his practice, and from his own tables I have taken 100 of his cases: of this number he bled 70, and of these 45 died; of the 30 who had not been bled, only 10 died: and yet, with this result before his eyes, the lancet continued to be used by him in every case in which he could get the patient to submit to it.

effect, or at least pushed to the extent at which I found it an invaluable plan of treatment. I do believe what I now inform you of will one day or other acquire me some little credit, and that I shall be considered, in some sort, instrumental to the conquest of a disease which hitherto has been deemed almost invincible.

Strong stimulants, diffusible and permanent, I now tried: I commenced with wine and brandy the first moment I saw the patient; whether the eye was suffused, the cheek flushed, and the skin arid, or the low delirium set in or not, I administered it in the following manner:—The first dose was a tumbler of hot brandy and water, about one-third spirit; this sometimes was vomited, and again repeated; the second time it usually remained on the stomach, and in the course of two hours it generally produced perspiration, even after James's powder had failed: two or three hours after the first dose another was exhibited, and the patient would feel less of the burning pain at the heart; if vomiting supervened, it was again repeated; and during the day it was now given every four or six hours, according to circumstances. The buboes commonly increased in size, and profuse sweating was often followed by *petechiæ*, or livid spots on the chest; when I saw this, I was always sure of my patient. The second day I increased the strength of the dose—instead of one-third spirit, I gave one-half, every eight hours—no intoxication came on, but a lethargic drowsiness was common enough, continuing till the perspiration broke out, or carbuncles appeared externally. If on the third day the patient was decidedly better, I kept up the excitement with strong cyprus wine, in frequent but small doses of two table-spoonsful every two hours; but if the bad symptoms were unabated, I continued to give the hot brandy and water, in increased quantities, till some decided change took place: this active treatment it was seldom necessary to pursue beyond the sixth day. Indeed in plague, if the patient live to the sixth day, he is very likely to recover; but the third day is that which is most to be feared. The only other treatment was once or twice opening the bowels with enemas, for purgatives by the mouth do no service; and spunging the body frequently with vinegar and water; the head was constantly kept soaked

with towels dipped in vinegar, and the buboes were poulticed with very hot cataplasms, sufficiently hot to give pain, and they were allowed to burst spontaneously.

With this treatment, at the rate of 75 per cent. recovered. In Candia, of nine patients, five recovered, and some of these were almost hopeless cases when I began to treat them. Every thing in plague of course depends on early treatment; for in a disease which commonly runs its course in three days, there is no time to be lost. On my arrival in Alexandria, I proposed to Mr. Salt and to Mr. Thurburn, to attend plague patients exclusively for one season. I required a small hospital entirely at my disposal, and undertook to save from 70 to 75 per cent. of the sick. Our consul promised to apply to the government on the subject; but going into quarantine himself shortly after, the business dropped: the fact was, Mr. Salt was very partial to me, and considered I was engaging in a fatal measure.

Mr. Thurburn, of the house of Briggs and Co., a gentleman of great amiability, and devoted to scientific research, took up my proposal, and was disposed to assist in carrying it into effect; but after the quarantine became general, all business was at a stand, and I heard no more of the new hospital.

I contented myself now with daily visiting the plague hospital; and I overcame the fears of my host, Mr. Casey, so much, as to take him with me, and go into every room in the pesthouse. Did I do so still doubting plague to be contagious? far from it: I had irrefragable evidence around me of its being contagious; but I had also good proofs of its being less so than small-pox, or even measles. Plague, under ordinary circumstances, is with difficulty communicated—I say so advisedly; but, like all other diseases, it may be rendered highly contagious, by crowding a number of patients into a small chamber, ill ventilated, filthy, and offensive. I believe that there are very few disorders which may not become contagious under such circumstances. In Rome, I have seen pulmonary consumption rendered infectious by the closeness of the sick chamber (for the air is always carefully excluded in this disease), and the *damp heat* of the climate. The Romans all know this disease to be highly infectious; yet the assertion will

appear monstrous in England. I have known repeated instances of persons going into a plague chamber, where the doors and windows have been kept closed, and the foulness of the atmosphere has been perceptible to the sense, exclaiming that their head was bursting with sudden pain, and they have gone home, and went abroad no more.

I do not say that contagion is generated *only* in the close, ill-ventilated chamber; but I say it is there augmented, in violence and virulence. Perhaps it may be inferred, that plague is therefore only communicated by the breath, and not by contact. I have reason to know it is communicated by both, in the instance of my own servant; he gave the disease to his brother by shaking hands, and the brother communicated it, through the atmosphere, to a lodger who casually entered the apartment for a moment, yet touched no person in it.

In a close chamber, the woollen clothes (above all) become saturated with the contaminated air; and if persons who waited on the sick entered without any other clothing than an oil-skin garment, sprinkled well with vinegar, the danger of infection would be diminished one-half.

In a word, plague under all circumstances is contagious; but under some, far more so than under others. In a well-ventilated chamber, where the bed-clothes are shifted daily, where the floor is washed daily, *and a fire kept constantly in the apartment (this I consider the most important agent of all in carrying off the foul air)*, there is hardly any peril in approaching the bedside of the sick—avoiding his breath, and suffering no part of one's dress to touch the bed-clothes; but four feet from the bed of the plague patient, in an airy room, there is no danger whatever. The miasma, I have ascertained, by much observation (so far as an invisible agent is amenable to observation or experience), does not extend beyond a very few feet from its source—I would say, not four feet from the bedside, and then it becomes so diluted by the surrounding atmosphere, as to prove innoxious.

I never, therefore, entered the plague hospital without having the doors and windows thrown open ten minutes before I entered; I generally took two glasses of Cyprus wine previously, and smoked a cigar or pipe all the time I

remained in the apartment of the sick. There is one thing I would much insist on, and that is the folly of the physician unnecessarily exposing himself to the contagion, by stooping over the sick, inhaling the poison of the patient's hot breath, and feeling the tumors and the pulse, for no other purpose than to excite the astonishment of the spectators. Nothing is to be gained from the pulse, no advantage is to be derived from opening the buboes, and no treatment is necessary for the carbuncles, except where gangrene is threatened, and then cutting freely across the carbuncle, and down to the very bottom of it, is necessary to arrest mortification; but, in general, the physician can do as much justice to his patient at the distance of four yards from the bedside, as he can do by sitting by him and fingering the plague sores. It is the many deaths of incautious medical men which give a character of terror to this disease, so that now plague practice is solely in the hands of a set of unprincipled, uneducated charlatans all over the Levant. Not long ago, a Dr. Giordano here, of some eminence, was seized with plague, after sitting on the bed of a patient who was dying of the disease: he passed the seventh day, the period when the danger is generally considered over, but he was deserted by his medical friends, one of whom had got the plague in his own family, and was so frightened as to abandon his patients. Poor Giordano had no attendance but that of a faithful slave, who never left him till she contracted the disease herself. At his death, when the neighbours visited his apartment, it was found that this poor fellow had actually died of neglect—that he had no one to quench his burning thirst in the agonies of death—no one to soothe or comfort him. The bed-clothes had been unchanged for many days, and the corpse was already covered with vermin. The slave died about ten days after her master. Do you imagine that a medical man can visit a case of plague in Alexandria without having the offensive corpse of poor Giordano before his eyes—without reflecting on the probability, while he is risking his life for the benefit of his fellow-creatures, that he too may be the victim of his humanity, or of his avarice (if, indeed, it be from a paltry motive he hazards life)—without anticipating the horror of a desolate death-bed,

without a friend or an attendant, abandoned by all, and unable perhaps to reach the cup which the parched lip and burning throat solicit? If you imagine a thinking being can run the gauntlet of pestilence, without fear or foresight, he must be either my superior in courage, or my inferior in knowledge of the plague.

I shall now give you a list* of the cases of plague I saw treated in the pest-house here, in 1825, begging you will remember, the hospital is only for Europeans, and those principally of the lower orders. Like all other plague hospitals, it is ill regulated, ill placed, and wretchedly attended. The treatment is below mediocrity: *sambuca*, or alder-flower water, is the principal internal remedy; bleeding and leeching are common; emetics and purgatives, if employed at all, are very properly used only in the beginning. I must mention the recovery of one patient here after bleeding, which is the only one I have seen do well after large depletion. Dr. Grassi was in the habit of opening the buboes in the hospital, and very unnecessarily, in my opinion, handling the sick: he communicated the contagion to his wife, who lived in the clean hospital†, adjoining the pest-house, and he bled her very largely, but at the same time he gave her stimulants and antispasmodics, such as bark, ether, and snake root. I visited her daily—it was a peculiar case, because the bubo was situated where I never before observed it, namely, over the pubis, and of an enormous size. The case was, moreover, peculiar for its successful treatment by bleeding; for although I heard of some few recovering after venesection, this was the first I saw. Madame Grassi, however, though she got over the disease, never recovered her strength; and a few weeks after her partial convalescence, she caught the “village fever” of Alexandria (tertian ague), and died ‡.

* We are compelled to omit this from want of space.—ED.

† To all the servants of the clean hospital was the disease communicated, from the pesthouse which adjoins it: in the course of the season the cook, the *capo di infermieri*, and a nurse died. What would Dr. M'Lean say to this?

‡ The above interesting account of the Plague is taken from Mudden's Travels, vol. i.

OBSERVATIONS ON LITHOTOMY:

Being the Substance of a Clinical Lecture

By BRANSBY B. COOPER, Esq.

ALTHOUGH I promised to give a clinical lecture only on the two cases of lithotomy which have lately occurred to me, still as they do not in themselves offer sufficient scope for particular observations, in consequence of death having supervened without any symptoms referable to the usual causes, I think it will be more useful to introduce the subject with some general observations on the stone or calculous disease.

By stone is meant, in the common acceptation, a morbid concretion from the constituent parts of the urine, which, whether it be found in the kidney or bladder, is for the most part ultimately lodged in the last-named viscus. Formerly this disease was looked upon as one of such importance, and offering so much danger in the operation necessary for its removal, that few surgeons, excepting those who paid exclusive attention to the subject, or those placed in public institutions, sought to practice in it; while now, in justice to the improved state of our profession, I ought to say, there are as few who do not feel themselves justified in undertaking this hazardous operation. No wonder, then, if this disease has for so long a period been the subject of the exclusive attention of some, and the general concern of all, that there should be a variety of opinions as to its causes and treatment.

The symptoms of gravel or stone are indicated by pain in the loins, extending along the ureters, sometimes attended with sickness, retraction of the testicle, and numbness of the thigh; these referring more especially to its first formation in the kidney, or during its passage from thence to the bladder. The symptoms particularly indicating its presence in this organ will be pain extending along the course of the urethra, most severe at the extremity of the penis; frequent desire to evacuate the bladder, the stream of urine being suddenly checked from the mechanical operation of the foreign body; and at the time of passing the water, a sensation of bearing down of the rectum; the pain is increased on expelling the

last drops of fluid, which is frequently bloody after exercise. It may be mentioned that in children the prepuce is always found much elongated; in consequence of their pinching the extremity of the penis during the paroxysms of pain.

All these symptoms most efficiently indicate irritation along the mucous surface of the urinary passages; and, as common sense would lead us to believe, so is it found, that under these circumstances a morbid state of the urine not only exists during the presence of, but prior to the actual formation of the calculus. What, then, are the changes which the urine undergoes?

1st. It is found merely morbidly acrid, indicated by its brandy redness, smallness of quantity, and the frequent desire to void it.

2d. It exhibits a tendency to deposit its constituents either in or out of the body, which, from the extreme complexity of the chemical composition of this fluid, are formed, as might be expected, equally complex and various—viz. they may be either acid, alkaline, or earthy, or indeed all combined. The nature of these deposits may be detected either by a superficial examination of the urine in the vessel which contains it, or more certainly by the delicate art of chemical analysis. The red gravelly deposit found at the bottom of the vessel after the cooling of the urine, detects the uric acid formation; and again, when a pink coating of the sides of the vessel shews the “high water mark,” this precipitation is composed of the lithate of ammonia. A turbid state of the urine, with a film upon its surface, either with or without a chalky deposition, marks the presence of the triple phosphate of magnesia and ammonia. All these may be accompanied with an increased secretion of the mucus of the bladder, either seen as flocculi, or generally disturbing the transparency of the fluid.

3d. The urine may have actually deposited a calculus, producing the symptoms above detailed, the true nature of which stone, although to be anticipated by the morbid changes of the urine, can only be certainly detected by an observation of its physical properties, or by chemical science. We may briefly observe, that as some of the chemical varieties of stone produce an aggravation of the local

symptoms, in which the constitution readily sympathises, it is necessary to be as early acquainted as possible with this circumstance, to enable us to adopt such treatment as is most likely to obviate its prejudicial effects.—(Here the lecturer entered into some detail on the constituent parts of urine and calculi, and referred his auditors to the able works of Marcet, Prout, and Howship.)

The sources of stone or gravel complaints are attributed usually to the three following causes—indigestion, disease of kidney, and disease of bladder; while at the same time it is true that each of these states may be secondary to the formation of calculus, as is exemplified by the concretion around a foreign body accidentally placed in the bladder.

Indigestion is too wide a field for a lecture of this nature fully to explore; we must, therefore, confine ourselves to that state of assimilation which has particular reference to the chemical state of the urine. It is clear that a healthy performance of this function enables the urine to hold all its constituents in solution; if, therefore, any circumstance disturbs the assimilating powers of the organs of digestion, it may so alter the relation of the solid to the fluid particles of the blood, that the kidneys are no longer capable of secreting and excreting than fluid in its natural chemical state. Thus, then, in those forms of indigestion in which acidity preponderates, it is not unfair to suppose that the same relative state of unequal acid proportions exists in the fluid from which the urine is separated; hence the lithate formations. This is the view which “chemical pathologists” have taken of this subject.

Of the diseases of the kidney, as connected with the formation of calculi, little or nothing can be known until we possess a more perfect knowledge of the physiology of secretion itself. Still it is not difficult to conceive that a morbid condition of the secerning portion of the organ would lead to an alteration in the fluid secreted; hence, as in the preceding case, a tendency to deposition may be produced. But, connected with calculus in the kidney, the various morbid alterations of structure so often found may be considered rather as the effect than the cause of the disease. The same observation may apply to many diseases of the bladder; but it is to be remembered that this organ does not

alter the nature of the secretion, nor add any thing to it but the mucus which lubricates its surface, being but a temporary receptacle for the fluid conveyed to it by the ureters. If, however, any cause delays its periodical evacuation, the urine has a tendency to decomposition, as evinced by the ammoniacal smell in cases of long retention, and may thus lead to calculous formations. This is further illustrated by paralysis of the bladder, from injury to the spine: in this case, may it not be supposed that the vitality of this viscus exerts some influence in maintaining a perfect solution of the salts contained in the urine, as a healthy state of an artery is necessary to the fluid state of the blood? This idea is rather thrown out as a subject for future investigation than stated as a well-ascertained fact. If a foreign body be lodged in the bladder, as a musket-ball, or fragment of broken bougie, we almost constantly find a deposition of the salts of the urine concreting around it. This latter circumstance is somewhat analogous to a crystallization around a foreign body suspended in a saturated solution of a neutral salt.

Supposing the diathesis to exist, discovered by an accurate examination of the urine, and attended with the symptoms above described, can we by medical means prevent the formation of a calculus; or, if formed, effect its removal? A strict attention to the digestive organs, as operating upon the first cause—namely, indigestion—offers to us the greatest probability of preventing the concretion: the most efficient remedies are tonics, bitters, magnesia, soda, acids, &c. given with a reference to the chemical state of the urine; not, however, to be persevered in, whatever that state may be, should any of these means tend to increase the irritability of the digestive canal. It is obvious from this, that an empirical mode of practice, as has so frequently been adopted by the use of Stephens' drops, lithontriptics, diet drinks, &c. can only be useful so long as they agree with the general state of the digestive functions. Functional diseases of the kidney and bladder may be ameliorated, as by the use of the *uva ursi*, or *liq. potassæ*, in diminishing the irritability of these organs, but morbid alterations of structure can seldom or never be successfully combated, as our diagnostic marks so

frequently fail in pointing out when and where disorganization has first taken place.

The diagnostic symptoms which have been described as concomitant with the presence of a stone in the bladder, are not at all times sufficiently well marked to prove its existence there; indeed many of them occur under other circumstances, for there are certain disorders of the bladder itself, or neighbouring parts, which give rise to many of those symptoms of calculus. Fungoid disease of the bladder, for example, will produce frequent desire to void the urine, and even its sudden stoppage, with an admixture of mucus, or of blood, and attended with pain of the loins; whilst an enlargement of the third lobe of the prostate will produce analogous effects. When, therefore, the systems I have just mentioned are present, viz. the frequent desire to make water, mucous or bloody urine, sudden stoppage of its stream, and especially if these symptoms be attended with pain at the extremity of the penis, the surgeon will take an early opportunity of sounding his patient. Having ascertained by this operation the actual existence of a calculus, we know that the only alternative for the permanent relief of our patient is its extraction by a surgical operation. Before performing it, however, we ought to take into consideration the various circumstances indicative of a favourable or unfavourable result, or, in other words, we ought to endeavour to form our *prognosis*. This is to be drawn from the age, constitution, and previous habits of the patient, and from the nature and extent of the local malady itself. If the patient be advanced in years; if his constitution be broken by dissipation, debauchery, or other irregularities; if his strength shall have been impaired by hardship, want, or anxiety; or more especially if he be of a scrofulous diathesis, or shall have indulged in the abuse of spirituous liquors, our prognosis ought at all times to be extremely guarded, for the most part unfavourable, and in aggravated cases, perhaps, utterly hopeless. If the disease shall have been of long continuance, having exhausted the strength of the patient by suffering and want of rest; if the bladder shall itself have become diseased, thickened, and per-

haps ulcerated ; if the albuminous state of the urine indicates organic disease of the kidneys, which, by-the-by, is but too certain a sign of constitutional atony, our prognosis cannot but be unfavourable. If, on the other hand, the patient be young, of moderately good constitution, and the bladder itself be sound, without any indication of important organic disease, either of the kidneys, liver, mesentery, or lungs ; and especially if, with these favourable indications, the patient be not of a peculiarly irritable or of a scrofulous habit, we have every reason for prognosticating a favourable issue.

Having said thus much respecting the prognosis, as drawn from the general and local symptoms existing at the time of sounding, it is but right to tell you that something, as regards the result, will depend upon the circumstances of the operation itself. It may, I think, be laid down as a broad principle, that the less we impose upon the constitution, in point of suffering, the more able will be the constitution to sustain the injury inflicted by the operation : should, therefore, any untoward event, such as an unfavourable situation or large size of the stone, its breaking within the grasp of the forceps, the depth of the perineum, or the presence of many calculi, retard the operation, we ought, perhaps, to make proportionate allowance on the side of danger, whilst, in every instance, considerable hæmorrhage, by debilitating the patient, is not less unfavourable. This, then, is all that need be said on the subject of *diagnosis* and *prognosis*, for I deal with principles, and not with detail. Our next subject, then, is the operation itself. I will not occupy your time by any lengthened detail respecting the operation “on the gripe,” or even respecting the more modern mode of the “high operation,” or cutting above the pubes, or the “recto-vesical” operation ; all these being now-a-days almost universally, and, I think, justly discarded. The only operation, then, with which I have to deal, is what has been called the “lateral operation,” which consists in cutting into the bladder, through the perineum, urethra, and prostate gland. Of doing this various plans have been adopted by various surgeons, or, to speak more correctly, many kinds of instruments have been employed to effect the same purpose.

It may be said, that, of all these, the object is to introduce, through the urethra, an instrument into the bladder, to cut through the perineum down upon that instrument ; to make it the guide for the knife into the bladder, by which a proper opening into that viscus may be made, so as to admit of the extraction of the stone. The instrument introduced through the urethra into the bladder has usually been of a form corresponding with the anatomical relations of the urethra itself ; such as the bent staff, which is generally employed for the purpose of lithotomy. Having introduced this into the bladder, our next object is to cut down upon it, and make it a director into the bladder. All are agreed, that, in cutting down upon it, a scalpel should be used ; but, having done this, some have employed the “gorget,” whilst others have completed the incisions with knives of different forms. With respect to the gorget I have little to say, as my experience of its use is very inconsiderable. It has, indeed, by some been regarded as a somewhat rude and unscientific instrument, probably in consequence of its rather attesting mechanical precision than the necessity for anatomical knowledge ; but when I remember the skill and success with which this instrument has been, and continues to be employed by some, although I decline descanting on its merits or demerits, I do not by any means feel myself at liberty to speak disparagingly of it. But for the reasons already noticed, I shall confine myself to the operation performed with the knife.

[Mr. Cooper then proceeded to describe the operation, and to exhibit the parts as they appeared in the case of J. Perring. Our limits oblige us to postpone the conclusion of his remarks till next week.]

ANALYSES & NOTICES OF BOOKS.

“ L'Auteur se tue à alonger ce que le lecteur se tue à abrégér.”—D'ALEMBERT.

Medico-Chirurgical Transactions, published by the Medical and Chirurgical Society of London. Vol. XV.

WE have given such full reports of the proceedings of the Medico-Chirurgical

Society (see vol. iii. *passim*), that it is unnecessary for us again to advert to the various papers which compose the present volume. The only subject to which this remark does not apply is the interesting paper of Mr. Travers on malignant diseases. We gave a sufficiently distinct outline of the first part, but our notice of the second part having been less perfect, we subjoin the principal facts it contains, in form of a condensed paper, in which we have retained the language of the author, omitting only such parts as our space renders it impossible for us to insert.

“ 1. *Cancer of the Face*.—The malignant ulcer of the integument of the face commonly begins in a small warty tubercle, hard, irritable rather than painful, sometimes discoloured, so as to look like a dirt-spot. It is usually seated upon the side of the face, upon or between the zygoma and base of the lower jaw. It is also met with, though rarely, on the forehead, lachrymal and infra-orbital fossa, and sometimes the chin. In the first stage it is slow—noticed even for years before it arouses the alarms of the patient. This is especially the case when obscured by the whisker, or situated in parts not obnoxious to the razor. When fretted by frequent handling or wounded, or irritated by caustic and stimulant applications, it inflames superficially, and becomes exulcerated, discharging a thin matter and scabbing by turns. It next acquires a broader base of induration, has a livid circumference, and an even and glossy surface of an unhealthy brightness. There is an occasional sense of heat and soreness, but not amounting to pain. The health continues unaltered. The third stage into which the disease shifts, is that of extensive ulceration both in breadth and depth; the ulcer having an irregular margin and surface, and a profuse suppurative discharge of a peculiar odour. Exuberant fungous granulations are intersected by deep interstices or hollows, in which are lodged ash-coloured sloughs of the exposed fascia, muscles, vessels, or nerves of the part. The countenance becomes disfigured by the encroachment of the ulcer upon contiguous parts, and by partial paralysis. The pain is now frequent, if not constant, burning and shooting. The complexion, strength, and flesh, undergo a gradual, but sensible change; the

mind becomes irritable and anxious, appetite and natural sleep fail, the pulse is rapid and small, and spontaneous bleedings take place at intervals. Ultimately death ensues from exhaustion, owing to interrupted deglutition and continual irritation; and for the most part it is accelerated by repeated loss of blood.

“ This sore is a specimen of the most purely local cancer, and long after its ulceration is established it is so circumscribed as to provoke the regrets of all parties that it was not removed in that state which preceded the development of a destructive action. The application of caustic to the diseased part is in every sense injurious. The proper and the urgent remedy is a free excision, both in breadth and depth, of the indurated wart or tubercle which has taken possession of the skin of the face, at a period of life when our experience tells us that the sign of peculiar and indissoluble warty hardness is an almost unquestionable feature of malignity. The absorbent glands are seldom affected before ulceration, or at least so affected as to contra-indicate excision. In the second stage above described, viz. of superficial ulceration, which is often long protracted, the patient becomes wearied by its obstinacy, and is subjected to the annoyance of having his hopes alternately raised and baffled by the marked but transitory improvement in the aspect of the sore under every fresh application.

“ This is not a very common disease; and when it offers itself to the surgeon's notice as an irregular ulcer, with hard and elevated margin, its character is too certainly marked to admit of a doubt as to its nature. In this stage I do not believe that it admits of cure, and after trying a variety of applications, I have come to the conclusion, that whatever irritates the cancerous ulcer, although it changes the surface, quickens the destructive action; that soothing applications which administer to the ease of the patient retard it, as the watery solution or epithem of opium, infusion of hemlock, &c. under a simple emollient ointment or poultice. The best tonic, and at the same time unirritating ointments, are those of the oxyds of bismuth, and of zinc properly diluted.

“ 2. *Medullary Tumor of the Face and Angle of the Jaw*.—This is some-

times seated in the cellular membrane, more frequently in the lymphatic glands. I have seen it occupying the situation of the zygomatic fossa, and also over the parotid gland, covering this and a portion of the buccinator muscle. Such tumors are at first moveable, of slow growth; little painful; they increase from the size of a small bird's to a goose's egg, when the skin is universally adherent, erubescant, and polished; their softness and appearance of pointing leads the inexperienced surgeon to mistake them for chronic abscesses; if they are punctured, blood only escapes. I have seen them situated on the hairy scalp. In this situation, which is rare, the subjacent bone is affected by the disease, or ulcerated by pressure before they reach any considerable size.

“ 3. *Cancer of the Eyelids and contents of the Orbit.*—This is a very strongly characterized disease, and very uniform in its character. It begins in the form of a hard, fretful, pimply ulcer upon either palpebra, or one of the borders or angles of the tarsi. It is discoloured by inflammation, and sometimes itches, discharges a thin matter, and scabs repeatedly. When it draws surgical attention, it is an irregular sore, notching or puckering the border of the affected lid by removal of its substance, and creeping around the orbit. Its progress is slow, but after some time the conjunctiva of the palpebra becomes elevated, thick, and rigid. The ulcer at length environs the orbit and eyeball, and a luxuriant fungus overshoots, and together with the hanging remnants of the lids, buries the eye, so that, although the globe remains, it becomes difficult to be seen. The pain is itching and burning. The ultimate stage of the disease presents a horrible appearance. For a long time the globe remains (I have even seen the cornea and humours clear) suspended, as it were geometrically, in the centre of the ruin; the malar and temporal bones are denuded, but an immense fungous mass encircles the orbit, and in part springing from it, is everted over the supercilium, nose, temple, and cheek. The globe at last perishes, but seems rather to yield to its complete insulation than to the destroying process which it has so long withstood. I have extirpated this disease when, as is rare, it has commenced in the loose conjunc-

tiva, removing the entire contents of the orbit. The disease reappeared upon the inferior palpebra. I have also known it removed in the fungous stage after the destruction of the lids, by which only a temporary respite was obtained. The lachrymal gland is sometimes exclusively affected with scirrhus, and in this state, previous to internal ulceration, I have removed it. The patient remained for some years free from disease. I have since lost sight of him.

“ 4. *Medullary Tumor of the Eyeball and contents of the Orbit.*—This disease has been so repeatedly and fully described of late years by the cultivators of ophthalmic surgery, that I conclude it is well known in its leading features to most members of the profession. The peculiar metallo-lustrous or tapetum-like appearance of the fund of the eye is not diagnostic: this is a fact highly important to be known.

“ The best diagnosis is founded on the increase of volume of the eye-ball, or the contrary, prior to the giving way of the tunics. Even this, and loss of shape, and discoloured tumors of the sclerotic, are, however, insufficient, as all may be produced by disorganizing choroiditis; but the progressive advance of the tumor to the cornea, and the shrinking and sloughing of the latter membrane, which happens prior to the protrusion of the fungus, is decisive of all doubts. The hydrophthalmic enlargement, or the direct collapse by interstitial absorption of the contents of the eye-ball, are sure indications that the disease is not malignant.

“ I have extirpated the eye affected with medullary cancer in several instances; but I am not acquainted with any case in which the patient, who has survived two years, has not been revisited by the disease.

“ 5. *Cancer of the Lower Lip.*—The commencement of this common and well-known disease is in the interjacent cellular tissue of the mucous membrane and skin. The enlargement and induration render it conspicuous before the villous surface of the lip cracks transversely, and oozes a thin fluid, then ulcerates and scabs by turns, and ultimately ulcerates deeper and fungates. The patient is generally a healthy male of advanced years, and accustomed to smoking. Pus sometimes escapes on a section of the fungus, but the stool or base of the tumor is hard, granular, or

seedy; the skin and mucous membrane and the labial glands, now prominent and warty, are closely compacted together and indurated. As the ulceration proceeds, the induration extends, and the salivary glands beneath, and the lymphatic glands, at one or both angles of the jaw, become sympathetically enlarged and tender. The healing of this sore is attempted to no purpose; cleansing, destroying the surface by escharotics, covering it by an artificial scab, are all in turn fruitless. The perfectly clean or new surface cannot be brought to form skin. The operation after the manner of hare-lip is simple, and in proportion to the loss of substance the cicatrix slight, and the deformity little perceptible; but there is a mode of operating which I prefer to that for hare-lip, and slow as the progress of the disease is, and little painful, the wisest way is to remove it freely in its early stage.

“ The mode of operating which I alluded to above, is the simple removal, by a full crescent-shaped section, of the substance of the lip. The commissures of the mouth should, if possible, be left—no suture is, of course, required. The contraction during the healing process under a double-headed bandage passing over the vertex and occiput, so as to keep a little moistened lint or simple ointment on the cut surface, shapes and adapts the lip with singular neatness; and what is more remarkable, the cut surface takes a depth of colour, and a plumpness and a defined border, which has much the appearance of the natural surface. I lately performed this operation, at the suggestion of Sir Astley Cooper, for an elderly gentleman from Grantham, who had twice undergone the hare-lip operation for the disease, under an eminent provincial surgeon. Although the substance of the lip was removed to the frænum, it was interesting to observe how much its natural figure and appearance were restored. The disuse of suture and ligature obviates a very irritating and objectionable part of the treatment.

“ 6. *Cancer of the Alveolar Membrane of the Lower Jaw.*—This is a rare, but very marked form of malignant disease. I have seen it only in aged persons. It commences at the point of reflection of the membrane of the gum on the alveolus, or on the inner side of the gum at the root of the teeth,

where the sore mouth, from mercury, is commonly first perceived. Small granular eminences or tubercles are formed, by which the membrane of the gum is raised and thickened into a small lump. The disease begins, in my experience, about the root of the last incisor or bicuspid, and thence gradually enlarges backwards to the middle molar teeth. Ulceration then ensues, the edges of the ulcer fungating and bleeding frequently; it is slowly, but progressively phagedenic, destroying the soft parts, and ultimately, by ulcerative absorption, the substance of the maxilla, so as even to divide the bone. The adhesive inflammation of the contiguous membrane and soft parts during this process, and the tumefaction of the submaxillary gland, give a peculiar elongation, breadth, and bulging of the jaw on that side, which is a characteristic feature of the disease. The imperfect opening and cleansing of the mouth, the difficulty of taking nourishment, and the horrible fetor of the discharge—the constant gnawing pain, with shoots darting upwards to the temple, render this a disease of great suffering. It admits only of palliation by the frequent use of antiseptic and detergent gargles and lotions, as of lime-water, camphor, myrrh, borax, honey, &c.

“ 7. *Medullary Tumor of the Mouth and Fauces.*—I have seen several instances of fungoid tumor situated within the cavity of the mouth; in one upon the upper maxilla, extending from the left alveolar process over the palate; in another, from the opposite alveolar process of the lower jaw, extending backward to the fauces and pharynx; in a third, and of this more than one instance, growing within and around the incisores teeth, and covering the symphysis of the lower jaw. The extirpation is attended with very free hæmorrhage, and is invariably, in my experience, followed by the rapid reproduction of the tumor, which does not break up into ulceration, but increases to such an extent as gradually to destroy the function of the parts necessary to nutrition.

“ 8. *Cancer of the Tongue.*—This is not a smooth and firm rounded tubercle, such as is often met with in this organ, but an irregular rugged knob in its first stage, generally situated in the anterior third, and midway between the raphé and one edge. It sometimes, but

seldom, extends across the middle line, although it often extends alongside of it. The hardness is unyielding, inelastic, and the mucous surface puckered and rigid. It also gives to the finger and thumb of the surgeon the sensation of solidity, or of its penetrating the entire muscular substance, being perceived equally on either surface. Sharp shoots of pain are felt through the side of the affected organ, towards the angle of the jaw and ear. The disease tends to run backward towards the base or posterior edge. It sometimes acquires great bulk before ulceration takes place, so as to project the tongue from the mouth. In this state a female patient of mine was seen some time ago in St. Thomas's Hospital, in whom the permanent projection of the diseased organ beyond the widely distended lips was from three to four inches. Life was sustained for a time by nutritive injections. The ulceration often extends from the edge of the tongue to the membrane of the mouth and gums, when the elevated and distended membrane at length gives way, and ulceration is rapid. The surface of the ulcer is very uneven, clean and bright granulations appearing in parts, and in others deep and sloughy hollows. The darting pain is very acute, but only occasional. There is a dull aching always present, and as constant a spitting as in deep salivation. The irritation is such as soon impairs the powers of life. It happens to strong and hitherto healthy persons, for the most part males from the age of 40 onwards. There is generally an evening paroxysm of pain, and the nights are much disturbed by the secretion accumulating in the throat, which excites cough. Often the patient is roused by a painful compression of the tongue falling between the jaws. The leaden hue of the countenance, the loss of flesh, and difficulty of taking food, although symptoms of the advanced stage of the disease, are observed long before the appetite or muscular powers fail in proportion. Frequent moisture with mild fluids, as tepid milk and water, or confectioner's whey, is grateful to the patient. Speech is much affected and painful.

“ Towards the fatal termination of the disease, occasional profuse hæmorrhages take place at shortening intervals, and alarm and weaken the patient, who ultimately dies tabid and exhausted,

generally with symptoms of more extensive disease of the mucous membrane in other parts.

“ Of all diseased states this is one of the most pitiable: it admits of palliatives only, and these very ineffective. I have seen only one case, wherein the ligature or knife had been employed, and in which I did not witness or hear of a recurrence. The black wash (3ss. of calomel suspended by mucilage in ʒij. of lime water) is upon the whole the best application. Local opiates seldom act as anodyne. Neither mercury, steel, arsenic, iodine, prussic acid, bark, nor any other medicine, have any permanent influence over the disease.

“ 9. *Cancer of the Antrum*.—This most disfiguring and destructive disease begins upon the lining membrane, and first shews itself in a bulging of the cheek under and upon the malar bone. The tumor is elevated, circumscribed, and hard, and the integument has a blush of colour. The pain is inconsiderable when the patient is alarmed by the appearance and increase of the swelling. The nostril soon becomes closed on the same side, and the teeth loose; they fall out, or are extracted, and a copious oozing of purulent ichor takes place into the mouth. The introduction of the probe by the nostril or palate is followed by free bleeding. If the alveolus is trephined, a fungus shoots up, fills the opening, and covers the gum. Next the palate becomes depressed, so that the arch on that side is lost, and either the eye-lids are closed, or the eye protruded; and completely amaurotic in either case. In the meantime the external swelling gains size, is quite immovable, and the skin acquires a livid hue. Small veins are seen rampant upon it in great numbers, forming a net-work. There are commonly one or more depressions where the bone is absorbed. These break and discharge pus. The patient suffers a good deal of burning and darting pain. The ulceration extends until the mouth communicates directly with the surface, and fluids escape from the wide opening in the cheek, which is surrounded by a raised, thick, everted border of granulation; or the openings are less direct and fistulous, in which case the tumor acquires an enormous bulk, and the roof of the mouth is upon a level with the incisor teeth, and compresses the tongue.

“ 10. *Cancerous Fungus of the Nares and Antrum.*—This is a growth essentially malignant, to which the common lining membrane is subject, though it is happily rare. It has no character of tubercle, but, on the contrary, is a brittle or friable fungus, excessively vascular, growing from the whole surface of the cell. I have seen it commencing in, and proper to the nares, but it is more frequently situated in the antrum. It distends the parietes enormously by its rapid growth, and although masses of it are cut or torn away, and the cautery applied to the cleared surface, it is reproduced again and again within the space of a few weeks.

“ 11. *Cancer of the Fauces and Pharynx.*—Scirrhus tonsil, like scirrhus testicle, is often talked of, but in reality seldom seen. But the broad papillæ at the root of the tongue adjoining the base of the epiglottis, the tonsil glands, and the mucous follicles of the common membrane of the glottis and pharynx, are each of them occasionally proper seats of the disease, beginning in tumor and induration, and terminating in fungus.

“ 12. *Cancer of the External Ear.*—The ear is rarely an original seat of cancer, although not unfrequently attacked by the encroachment of an ulcer on the cheek. I have once, however, seen the upper third of the external ear the exclusive seat of an indurated sore, having every character of cancer, and amputated the diseased piece. The wound healed, and the patient, I believe, remains sound.

“ 13. *Medullary Tumor of the Internal Ear.*—I have seen one example of this disease. The sufferings of the patient were severe from the confinement of its situation, and the displacement of parts; and the deformity was excessive. Externally, the tumor extended from the temporal fossa to the angle of the lower jaw; and internally, to the posterior nares and fauces. The mastoid cells were apparently not invaded by the tumor. The jaw became locked, and a bleeding fungus filled the meatus auditorius. The same side of the head and face, and the muscles of deglutition, were paralysed. To this coma succeeded. The patient was nourished with great difficulty, and his death was accelerated by inanition. The post mortem examination, to my great

disappointment, was peremptorily refused.”

The diseases sometimes mistaken for cancer are—crustaceous herpes, an affection resembling elephantiasis, lupus, certain ulcers of the mucous membrane of the mouth, fauces, &c., globular tumor of the tongue, and various polypi.

MEDICAL GAZETTE.

Saturday, August 1, 1829.

“ Licet omnibus, licet etiam mihi, dignitatem *Artis Medicæ* tueri; potestas modo veniendi in publicum sit, dicendi periculum non recuso.”—CICERO.

EFFECTS OF PHOSPHORUS AND OF HEAT ON THE ANIMAL BODY.

THE only *novelty* that we know of at present likely to interest our readers is the appearance on the stage of a M. CHABERT, who professes to eat arsenic and drink prussic acid, and with the wonders of whose exploits some of the newspapers have lately been teeming

The general impression of those who have seen Chabert is in his favour, in so far as regards the fact of his swallowing certain substances which on the generality of mankind act as poisons. At his last exhibition, for instance, he swallowed twenty-two grains of phosphorus; and on a former occasion is said to have taken two scruples. The phosphorus was brought by Sir G. FARRANT, and Chabert rapidly bit off some pieces, amounting to the quantity above-mentioned. These were put into a spoon; and while he kept his hands behind him, to prevent the idea of any undue interference on his part, they were apparently, and we believe really, poured down his throat. He held the head back, with the mouth open, and the tongue slightly protruded, performing the act of deglutition very rapidly, so as to avoid allowing the phosphorus to remain in contact with the tongue. This is unquestionably an extraordinary feat, and shews a power of resisting the effects of such doses of this substance as would probably destroy

most individuals: still there is nothing in it which appears to us absolutely marvellous, as phosphorus in smaller quantity has frequently been taken with impunity.

MENTZ, a German physician, recommended phosphorus, in 1751, as a powerful stimulant, and published some cases illustrative of its efficacy; and on his authority it has since been occasionally used in Germany.—In France, ALPHONSE LEROY experimented with it on his own person, and took three grains in treacle: this caused great uneasiness, which, however, was relieved by copious draughts of cold water; and he affirms that next day his muscular strength was considerably increased. He relates the cases of a young man who recovered from the advanced stage of typhus fever under the use of phosphorus, and of an old man who was restored by it from a state of extreme debility.—Dr. CONRADI also asserts that he has known it succeed when other stimulants had failed.—All the experiments, however, did not terminate so favourably. WEIKARD was consulted by a Jew who had lost his speech and the use of his limbs, in consequence of an apoplectic seizure: two grains of phosphorus were administered to him, rubbed up in a conserve; next day three grains were given in some honey, and WEIKARD informs us that it was his intention to have increased the dose still farther next day, but that in the meantime the unfortunate Jew was taken ill, and died on the fourth day in great agony.—In our number for July 11th will also be found the case of a chemist at Biel, who was poisoned by three grains. BRERA likewise tried it in a case of paralysis. He gave two grains dissolved in mucilage of gum arabic, and directed it to be taken in divided doses, so that each should contain half a grain of phosphorus. His patient appeared to be better after the first dose; but scarcely had she taken

the last, before she was seized with burning pain in the stomach, and died in 24 hours.—ALIBERT tried a series of experiments with this substance, principally in epilepsy. The method he adopted was to incorporate a grain in an ounce of mucilage, and to give it in the course of 24 hours. The general result was, that it impaired digestion, without curing the disease for which it was given.—The latest publication on this subject, so far as we know, is that of M. LOBSTEIN, which appeared in 1815; and the opinion he expresses with regard to the medicinal powers of phosphorus is so favourable, that we cannot but regret that it is not corroborated by others. He used it chiefly in fever, and states that the pulse improves, and delirium diminishes very speedily, under its exhibition. He also mentions that the evacuations become luminous in the dark, when it is given in sufficient doses.—HUFELAND says that a small portion of phosphorus, if allowed to come into contact with the stomach, is apt to excite inflammation, but speaks favourably of it as a stimulant, in doses of about one grain in the day, when carefully mixed with mucilage by long-continued trituration. To return to M. Chabert:—it appears that the internal exhibition of phosphorus in small doses has often been practised; and that one individual (LEROY) took so much as three grains. But it is the result of general experience that the system may become reconciled to large doses of the most powerful agents, provided they are very gradually and cautiously increased—witness opium. Half a grain is the usual dose of lunar caustic, but we have known an individual take sixty grains in the course of twenty-four hours in five-grain pills—a feat scarcely less wonderful than that of Chabert.

As to the arsenic and prussic acid, it will be time enough to inquire about them when it appears that he has actually taken them. At present his abi-

lity to do so with impunity rests on his own authority. With regard to holding his head for a short time in the fumes of arsenic, it is of very little importance even if he really did it. Nor can we avoid hinting, that throwing sulphuric acid upon a chafing dish, so as to raise sulphurous acid vapours, and thus half choke those who came near, savoured very much of trickery, as did several other parts of his conduct. Neither do we attach much importance to the feat of swallowing oil at 310° . The effect of any body, at a high temperature, in producing a sense of heat, depends very much on the rapidity with which it parts with caloric; in other words, on whether it be a good or bad conductor. Thus, it might have been observed, that though Chabert suffered the oil to be put into his mouth, he avoided letting the spoon even touch his tongue, because the metal, though it could not be hotter than the oil which it contained, parted with its heat much more rapidly, and would thus have burnt him.

M. Chabert is represented in the *Literary Gazette* as possessing three antidotes—one, a preservative against vegetable, another against animal, and a third against mineral poisons; nay, he even holds out that he has an antidote to hydrophobia, and is able to save men “from every species of poison.”

If he really possess such important secrets, the Editor of the *Literary Gazette* thinks “that they ought to be ascertained, and he largely rewarded as a public benefactor.” It is only the notice which has been taken of these performances in so respectable a publication which induces us to advert to them at all; and we agree that the secret of his antidotes ought to be purchased, “if he really possess such;” but we do not believe that he does. That the same thing should prove an antidote to all the poisons taken from one kingdom—to arsenic, for example, and corrosive sublimate, and

verdigris, and sulphuric acid,—agents having nothing in common in their chemical composition, or in their action on the animal body—is too monstrous an improbability for any intelligent person to credit. And even if it should be found that Chabert can really take these poisons with impunity, which we do not imagine, we should still hold it more probable that he had gradually accustomed himself to them than that he possessed any one general antidote. We may mention, too, that Chabert retired to change his dress after he had taken the phosphorus and oil, and remained long enough absent to have vomited these substances, if he was desirous of so doing, and that he took no poison after he had been in the oven. We suggest this merely as a possibility, but if so it would deprive the experiment of much of its anomaly, as it is expressly stated by Lobstein that the effects of a dose of phosphorus are scarcely ever perceptible in less than four hours. The subject, however, is worthy of some attention: but then the investigation would require to be carried on by much cooler heads than those who have already volunteered their testimony in Chabert's favour, and who seem inclined to swallow all his assertions with as much avidity as they did his beef-steak. And this brings us to the last part of the performance, which, though it excited the greatest admiration on the part of some of the spectators, was in reality the least wonderful of the whole. An oven was heated, into which Chabert entered in a flannel dress and thick-soled shoes, being provided with a sort of funnel, communicating with the external air, through which he breathed. So far from having any means of guarding against the effects of the heat, he was dreadfully oppressed, and at the end of eight minutes and a half burst out panting and exhausted, being evidently quite unable to bear it a moment longer. His breathing

was performed very rapid, the expirations being performed forcibly and with much puffing. What the exact heat of the oven was, we are unable to say, as no thermometer was placed in it at the time Chabert entered; but shortly after he came out, one which was placed in it (much against his inclination) only rose to about 180° !

The heat of the oven in this case, therefore, was probably not greater than that of the rooms in which SIR CHARLES BLAGDEN, SIR JOSEPH BANKS, and others, remained for a considerable time without any communication with the external air, and with comparatively little inconvenience. According to M. Tillet*, girls who had been accustomed to attend an oven, bore for ten minutes a temperature equal to 280° Fahrenheit; and a Spaniard, named Martinez, within this twelvemonth, used to exhibit at the Tivoli, in Paris, who remained in an oven, at the temperature just mentioned, long enough to have a fowl roasted beside him, and to eat it†.

The most scientific experiments of this kind, and consequently the most interesting, are detailed by Dr., afterwards Sir C. Blagden, in the sixty-fifth volume of the Philosophical Transactions. As these may not be within the reach of all our readers, we subjoin some extracts.

“ Soon after our arrival‡, a thermometer in the room rose above the boiling point: this heat we all bore perfectly well, and without any sensible alteration in the temperature of our bodies. Many repeated trials, in successively higher degrees of heat, gave still more remarkable proofs of resisting power. The last of these experiments was made about eight o'clock in the evening, when the heat was at the greatest: a very large thermometer, placed at a distance from the door of the room, but nearer to the wall than to the cockle, and defended from the im-

mediate action of the cockle by a piece of paper hung before it, rose one or two degrees above 260 . Another thermometer, which had been suspended very near the door, stood some degrees above 240 . At this time I went into the room, with the addition to my common cloaths of a pair of thick worsted stockings drawn over my shoes, and reaching some way above my knees. I also put on a pair of gloves, and held a cloth constantly between my face and the cockle. All these precautions were necessary to guard against the scorching of the red-hot iron. I remained eight minutes in this situation, frequently walking about to all the different parts of the room, but standing most of the time in the coolest spot, near the lowest thermometer. The air felt very hot, but still by no means to such a degree as to give pain; on the contrary, I had no doubt of being able to support a much greater heat; and all the gentlemen present, who went into the room, were of the same opinion. I sweated, but not very profusely. For seven minutes my breathing continued perfectly good; but after that time I began to feel an oppression in my lungs, attended with a sense of anxiety, which gradually increased for the space of a minute. I thought it most prudent to put an end to the experiment, and immediately left the room. My pulse, counted as soon as I came into the cool air, for the uneasy feeling rendered me incapable of examining it in the room, was found to beat at the rate of 144 pulsations in the minute.

A chief object of this day's experiments was to ascertain the real effects of our cloaths in enabling us to bear such high degrees of heat. With this view I took off my coat, waistcoat, and shirt; and in that situation went into the room as soon as the thermometer had risen above the boiling point, with the precaution of holding a piece of cloth constantly between my body and the cockle, as the scorching was otherwise intolerable. The first impression of the heated air on my naked body was much more disagreeable than I had ever felt it through my clothes, but in five or six minutes a profuse sweat broke out, which gave me instant relief, and took off all extraordinary uneasiness. At the end of twelve minutes, when the thermometer had risen almost to 220° , I left the room very much fatigued, but no otherwise disordered, my pulse being

* Memoirs of the Academy of Sciences, for 1764.

† See Gazette, vol. ii. p. 179.

‡ Phil. Trans. vol. 65, p. 484.

136 in the minute. Several of the gentlemen present, as well as myself, went into the room without our shirts many times afterwards when the thermometer had reached almost to 260°, and found we could bear the heat very well, though the first sensation was always more disagreeable than with our cloaths. To prove that there was no fallacy in the degree of heat shewn by the thermometer, but that the air which we breathed was capable of producing all the well-known effects of such heat on inanimate matter, we put some eggs and a beef-steak into a pan or tin frame: in about 20 minutes the eggs were taken out roasted quite hard, and in 47 minutes the steak was not only dressed, but almost dry. Another beef-steak was rather over done in 33 minutes. In the evening, when the heat was still greater, we laid a third beef-steak in the same place: and as it was now observed that the effect of the heated air was much increased by putting it in motion, we blew upon the steak with a pair of bellows, which produced a visible change on its surface, and seemed to hasten the dressing: the greatest part of it was found pretty well done in 13 minutes. . .

The same person, who felt no inconvenience from air heated to 211, could not bear quicksilver at 120, and could just bear rectified spirit at 130; that is, quicksilver heated to 120° furnished, in a given time, more heat for the living powers to destroy than spirits heated to 130°, or air at 211°."

Dr. Dobson and several others went into the sweating-room of the hospital at Liverpool, when it was heated to 224, without inconvenience.

HOSPITAL REPORTS.

GUY'S HOSPITAL.

Lithotomy.

GEORGE WILLIS, æt. 48, was admitted into Job's ward in the month of May, suffering from disease of the bladder, accompanied with symptoms of stone; he was very much weakened from a long confinement to bed for the cure of a stricture. About the month of June last year, he was admitted under the care of Mr. Key, having a very firm stricture, to cure which an opening was made in the urethra. He had not left the hospital many months before he was compelled again to seek relief for his sufferings.

The usual remedies were given with advantage, but yet he suffered greatly; it was, therefore, determined to remove

the stone as soon as it could be fairly ascertained to be present; for it must be observed, that for two or three months it was doubted whether there was stone in the bladder or not. Two or three times he was carried to the theatre, for the purpose of having the operation performed; but when sounded on the table, the stone could not be felt. The operation of sounding always excited very excruciating pain; the bladder was felt to be roughened and hard. After a variety of opinions upon the subject, all the surgeons at length agreed that there was a stone, and that it was soft.

On the 14th July the operation was performed by Mr. B. Cooper. After the incision was made into the bladder, instead of one stone, two were felt. There was great difficulty in extracting them, on account of the extreme softness of the external layer of earthy deposit which broke under the slightest touch of the forceps. The scoop was used to extract the fragments. A large dose of opium was given to him immediately after he was removed to bed. About an hour after this he was visited, and found to be recovering from faintness; he complained of a little pain. Camphor julep was directed to be given to him frequently. In the evening he was tolerably easy, so as not to require an anodyne.

15th, eight A.M.—Free from pain, except when the water passed through the wound; in other respects he felt very comfortable; pulse 90, soft and regular; no unusual thirst; tongue white and furred, but moist; skin warm and moist. At 11 o'clock, however, these pleasing symptoms disappeared, and were changed for others of a less favourable nature. The countenance was altered, from a state of calmness to that of anxiety and distress; his head was continually rolling from side to side on the pillow, as if suffering from great pain, of which he did not at that time particularly complain; pulse extremely rapid, full, and soft; tongue moist, and covered with a whitish fur; no pain on pressing the abdomen.

Calomel gr. iss. Opii gr. ss. n. maneqe; and the following draught twice a day—
Mist. Camphoræ ℥iss. Ammon. Carb. gr. v. Guttæ Nigræ gtt. iij. ft. haust.

Nine o'clock P.M.—Much better; perfectly calm and free from pain.

16th, eight o'clock A.M.—Extremely comfortable; passed most of the night in sound sleep.

At 9 o'clock P.M.—Did not complain of pain or other unpleasant feeling; pulse was, however, remarkably rapid, full, and soft, which, together with the appearance of his countenance, which was not so calm as it had been, induced Mr. Callaway to give him—

Træ. Opii gtt. xxv.

17th, eight o'clock A.M.—Expresses himself as being very easy; has enjoyed a very

good night's repose ; pulse not more than 90, and regular.

At eleven o'clock he became very uneasy, his countenance having changed as yesterday at this time, assuming an appearance indicative of great distress, but yet he did not speak of pain ; pulse remarkably rapid, so as with difficulty to be numbered ; bowels had not been opened since the operation, and therefore had taken early this morning some house medicine—several doses were taken without effect, until an enema was injected. After the bowels had been freely evacuated, which was about three o'clock P.M. his countenance immediately assumed its former tranquillity ; pulse became less both in volume and in frequency ; free perspiration broke out, and in a short time he was in a very comfortable condition.

Nine o'clock P.M.—Had a rigor, heat and perspiration following it. No pain.

Træ. Opii gtt. xxx. statim.

18th, eight o'clock A.M.—The patient looked remarkably well, and declared that he felt quite at ease ; pulse 90, regular, and soft ; tongue whitish, furred, but moist ; last night's repose was not so good as that of the night before ; he was very much disturbed by a man that had an attack of epilepsy.

At 11 o'clock had a very severe rigor, accompanied with pain in the wound and abdomen, and great uneasiness, throwing himself to and fro in the bed ; to this quickly succeeded heat and perspiration ; pulse very frequent, not to be numbered with exactness.

Træ. Opii gtt. xxx. Julep. Am. Acet. 3iss. stat.

About ten o'clock he became calmer, and more free from pain. Mr. Callaway visited him, and directed him to take wine and opium, with aromatics, two or three times a day.

Nine o'clock P.M.—Was perfectly calm, and in a sound sleep.

19th, ten o'clock A.M.—Slept well all night, and this morning was free from all unpleasant feelings until this time, when he felt the rigors approaching ; pulse quick and fluttering ; tongue moist, and not so much coated. Mr. Callaway ordered—

Sulph. Quinæ gr. v. Træ. Opii 3ss. Aquæ 3i. stat. To continue the wine, opium, and aromatics.

The wound two days ago seemed very little disposed to heal, the edges were rather everted, and looked unhealthy. Poultices were applied, and this morning it looks better.

Evening.—Had another dose of quinine and opium in the afternoon ; the rigor did not return, but hiccup, for the first time, was observed to take place ; he was greatly disturbed by it every two or three minutes ; skin very hot ; pulse quick and small.

20th A.M.—Very ill ; the hiccup con-

tinues ; pulse quick, small, and intermittent ; extremities cold ; tongue covered with a dark brown fur.

Evening.—Gradually sinking ; hiccup still present ; he has taken the wine, opium, and aromatics, with an egg, two or three times during the day.

21st.—A few minutes after nine o'clock this morning he died.

The body was not examined.

ST. GEORGE'S HOSPITAL.

Femoral Aneurism—Inflammation of the Sheath of the Vessels.

JAMES CLARKE, æt. 40, a travelling umbrella-maker, admitted June 19th, under the care of Mr. Hawkins.

The disease commenced two months since, during a long walk, towards the end of which he felt pain in the thigh, and distinguished a small tumor of the size of a marble. It has since then gradually increased, and lately he has suffered from occasional rigors and general disturbance.

The tumor seems to have begun just where the artery passes into its tendinous sheath, and is now of the size of a large orange, projecting partly towards the ham, but principally on the front of the thigh. It pulsates very strongly. It can be in great measure emptied, but immediately fills again, and it is very painful and tender. There is a good deal of pain and tenderness in the course of the artery, as high as the groin, and for several inches above the tumor the sheath is felt thickened and enlarged from deposition of lymph. The ankle is slightly swelled, and the branches of the saphenæ are remarkably large. He cannot quite straighten the knee.

He was kept in bed, on low diet, and purged.

21st—Pulse quicker, 98. Countenance indicative of intense pain, which he complains of more in the leg, in the course of the saphenæ nerve, than in the tumor itself.

V. S. ad 3viii.

25th.—The fever was lessened by the bleeding, but much pain continued in the tumor and down the leg, and the aneurism has evidently increased considerably since his admission, and is very tense at the lower part. This morning he had two rigors, followed by heat ; but as Mr. Hawkins believed his fever depended on the rapid increase of the tumor, the operation was performed.

The artery was tied a little way below the profunda. The sheath was found, as was expected, much thickened, so as to require the division of several layers of fascia before the artery was exposed, and quite concealing the vein. Two vessels came off in front of the artery and were cut, one requiring a ligature. The vessel was tied

with a single thread, and a small piece of lint, dipped in oil, was inserted between the lips of the wound, at the part where the ligature was brought out. A flannel roller was put round the limb, which at first felt cold and numbed, and cold lotion was applied to the tumor; 20 minims of *Liq. Opii Sedat.* were administered. In less than an hour all pain had ceased, and he said he felt "in heaven," compared with what he had experienced for some time.

26th.—All irritation gone, pulse only 84, and from the time of the operation every bad symptom vanished. In fact, we never witnessed such complete relief from the operation.

27th.—Lint removed from the wound.

29th.—Wound dressed, and found to have completely united by the first intention, except where the ligature came out.

July 16th, twenty-first day.—The ligature came away. The tumor is now not a quarter of its former size, and is no longer visible to the eye; it is hard and moveable.

In his clinical lecture on this case, Mr. Hawkins remarked, that his reason for adopting the unusual practice of inserting a piece of lint into the wound, was his having often seen union take place in the whole line of the skin, by which matter formed round the ligature was confined, and thus the union forced open again by the suppuration and sinuses formed, which were very tedious in their cure, and perhaps the still more formidable consequence of unhealthy ulceration of the artery might sometimes be referred to the same cause. The greater tendency of the skin to unite by the first intention, is occasionally attended, he remarked, by similar bad consequences after the operation for stone, the wound requiring to be forcibly re-opened, to obviate the confinement of the urine. Certainly, in this case, the practice was most successful; for it was impossible for union to be more perfect, and the small quantity of pus round the ligature escaped readily, before the wound was examined and dressed elsewhere.

GLASGOW ROYAL INFIRMARY.

Singular Affection of Legs, resembling Elephantiasis.*

MICHAEL COSGROVE, aged 61, admitted 28th July. The right leg and foot were more than three times their natural size. The swelling was uniformly firm and resisting, although a very trifling impression remained on pressure being continued for a short time with the point of the finger. The skin was much thickened, and elevated into numerous small nodules along the fore part of the leg and dorsum of foot, while it was rough, and covered with a scurf behind. In the interstices of these tumors there was superficial ulceration, discharging a serous, offen-

sive fluid, which, on exposure, soon became converted into brownish incrustations. The swelling of the leg and foot were separated in front by a fissure extending across the ankle joint. This was about an inch and a half in depth, and sufficiently broad to permit of the finger being passed to its bottom.

He gave the following very indistinct history of his complaint:—About eighteen months previously, had suffered compound fracture of both bones of the right leg. Inflammation and sloughing took place, and a cure was not effected for the space of five months. Shortly after this, both his legs began to swell. The swelling gradually extended upwards to the trunk. Openings then formed in the scrotum, thighs, and legs, giving issue to an immense discharge of watery fluid. The swelling in consequence became daily less, and at length these openings healed up. Both legs, however, remained a little swollen, and about nine months prior to admission, the right one, which had remained weak from the time of the accident, began again to enlarge, and get daily more firm. The ulceration on its surface broke out about that period. The left leg did not increase in thickness for several months afterwards, when it also ulcerated. His urine was, perhaps, rather scanty, but in other respects he enjoyed excellent health, with the exception of dyspnoea, to which he had been subject for many years.

On the 8th he was ordered to use the following powder three times a-day.—

R Calomelanos, gr. ii.
Pulv. Scillæ, gr. i.
— Zingib. gr. ii. M.

And to have a piece of caddis, moistened in the following lotion, applied to the limbs, which were to be firmly bandaged:—

R Liquor Potassæ, ℥ii.
Aquæ, lb. iss. M.

The ulceration dried up very soon after commencing the use of the above application. The legs also sensibly diminished in thickness; and by Sept. the 4th the surface of both had lost its fissured tuberculated appearance. He generally voided lb. v. of urine daily, from the use of the powders, which were now omitted, the mouth being affected. The lotion and bandaging were continued; and on leaving the house, on the 13th October, the left leg was of its natural thickness, the right still continuing a little enlarged, although the swelling was perceptibly subsiding.

NOTICE.

Mr. Castello's answer to the account of M. Heurteloup's method of pulverising stones in the bladder, was received too late for insertion in the present number: we shall give it next week.

* From the Glasgow Medical Journal.

THE LONDON MEDICAL GAZETTE,

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OF
Medicine and the Collateral Sciences.

SATURDAY, AUGUST 8, 1829.

ABSTRACT OF A CLINICAL LECTURE

ON

AORTIC ANEURISM,

With Observations on the Application of Ligatures to the Distal Side of Aneurismal Tumors,

Delivered at Guy's Hospital, July 29, 1829,

By C. A. KEY, Esq.

THOMAS RILEY, æt. 45, admitted into Lazarus' ward, July 15, with an aneurismal tumor at the upper part of the chest. He first experienced unusual sensations about the shoulder, on the right side, about a month ago, and first perceived a tumor about three weeks since, at which time it did not exceed in size a common hazel-nut. It has grown rapidly larger, being now about as large as a hen's egg. The centre of the tumor is somewhat below the right sterno-clavicular articulation, which is slightly projected forwards by its pressure; the cartilage of the first rib appears also to have been partly absorbed. Its pulsation is distinct, and of the aneurismal kind; it is not merely a vibration, but the finger, when pressing it, is raised at each contraction of the heart; and when the pressure is suddenly withdrawn, the blood can be felt to rush in with force, and immediately to dilate the sac. The tumor can be traced as high as the upper margin of the sternum, and outwards behind the insertion of the sterno-mastoid muscle. Below, the pulsation is less forcible; but when the ear is applied to the space between the second and third rib, the impetus of the tumor can be distinctly heard. His health is somewhat impaired from hard work, and the effect of drinking spirits; the latter habit he has lately been

addicted to from the relief which he imagined it would afford him. His pulse is about sixty in a minute; and, when he is quiet, not remarkable for any thing peculiar; it is free from the usual jirk of an aneurismal pulse. He has no pain in his chest, and does not complain of cough; neither has he any uneasiness except pain about the shoulder, extending up the right side of the neck, which may be entirely attributed to the pressure of the aneurism upon the surrounding nerves and other structures.

I make this case the subject of a clinical lecture in consequence of a question put to me, "whether I did not consider it an aneurism of the arteria innominata, and whether it were not a case for the operation of placing a ligature on the arteries conveying the blood from the aneurismal sac." Without entering generally into the subject of aortic aneurism, I shall notice those points that have reference to the case before us.

It appears to me that the case is not an affection of the arteria innominata, but of that portion of the arch of the aorta from which the arteria innominata takes its origin. It differs much in situation, and in other respects, from an ordinary aneurism of the aorta; and at the same time might, from superficial observation, be so easily mistaken for aneurism of the arteria innominata, that it may not be useless to notice to you the course which aneurism of the upper portion of the aorta usually takes.

You are doubtless aware that the early stage of internal aneurism is marked by scarcely any symptoms; the change which the coats of the artery undergo before they yield to the impulse of the blood being the result of an ac-

tion that can hardly be termed inflammatory. The patient is not conscious of any pain, and the disease makes progress before any indication of its existence is obtained. The earliest symptom attending it is usually pain referred to some distant point; or in this case, cramps in the shoulder, in consequence of the tumor gradually making pressure upon the neighbouring nerves. The pain is generally ascribed, both by patient and medical attendant, to rheumatism. Those who are unaware of the insidious progress of an aneurismal tumor, would with difficulty credit the account given by this patient, that he had only discovered the swelling within the last three weeks: its size characterizes it as a disease of some months standing, and the absorption which the parietes of the chest have undergone must have been the result of long-continued pressure. The late discovery of the tumor is one in addition to many other cases that might be adduced to shew the absence of symptoms until the surrounding parts are inconvenienced by the pressure of the tumor.

The progress and symptoms of the tumor are very much determined by the part of the vessel at which the disease happens to begin. In these remarks I intend to confine myself to the ascending aorta and its arch. When it has its origin in one of the sinuses of Valsalva, a by no means unusual seat of aneurism, the symptoms of ailment are almost entirely wanting; it gradually increases in size, though rarely acquiring any considerable magnitude; being connected with the pericardium, where it is reflected from the aorta, it soon forms adhesions to that membrane, and by its pressure soon ruptures it. From these small aneurisms, patients suddenly expire without having previously had any sign of indisposition. The sudden escape of the blood into the cavity of the pericardium instantaneously stops the heart's action. We have in the museum more than one instance of this form of the disease.

A sailor, who had not been heard to complain, but was thought to enjoy good health, while engaged on board ship at Woolwich, in cleaning the deck, suddenly fell; and, when raised up, was found to be dead. Examination of the body after death shewed a small aneurism just above the semilunar valve of the aorta, which had burst into the

pericardium. The aperture in the sac is scarcely larger than a crow's quill.

When the coats of the vessel give way about the middle of the ascending aorta, the tumor often acquires a considerable size; not being closely connected with the pericardium, nor with the pleura, it has time to increase. The course which it takes will depend upon its connexion with the vessel, whether it arise from the back or anterior part of the artery. In the former case it does not make its appearance externally as a tumor, but produces those obscure symptoms of dyspnœa which are common to most organic changes in the structure of the heart and its vessels. Even Laennec seemed to be possessed of no pathognomonic sign by which he could with certainty detect a latent aneurism at this part. Perhaps the only symptom that can be depended upon is the impulse (not a vibration) that is given to the ear on the right side of the sternum, a sound too distant to be communicated by the contraction of the heart, and yet likely without careful distinction to be mistaken for it. The contraction of an enlarged heart, when the impulse, or rather vibration, is diffused over the chest, is also liable to be regarded as aneurism of the aorta. The more frequent progress of this tumor is towards the anterior parietes of the chest; it there adheres to, and absorbs the cartilage of the third rib, and appears as a pulsating tumor on the right side of the sternum. This is by far the most common seat of aneurism of the ascending aorta. Its course to the right side arises from the heart preventing it increasing towards the left side of the chest; and its early adhesion to the parietes of the chest determines the course which it usually takes towards the third rib. A case lately occurred under Dr. Bright, in which it protruded at the cartilage of the second rib; and the present case appears to be, for reasons that I will presently state, an aneurism of the commencement of the arch appearing just below the first rib.

When the commencement of the arch, or the upper part of the *aortus ascendens*, is the seat of the dilatation, it either takes the course of the *arteria innominata* or ascends behind the sternum. In the former case it has the characters of aneurism of the latter vessel; the tumor being confined by the fascia and the sternum, suddenly dilates as soon as it leaves the chest, and the narrow neck

of the swelling gives it more of the form of an aneurism of a small artery than of the arch of the aorta. When the tumor mounts more completely from the arch, it either appears above the sternum, and is readily recognized, or it sometimes is confined within the cavity of the chest, and its pulsations are not visible above the sternum. When it happens to be situated below the sternum, it increases in size towards the vertebræ, and thus makes pressure on the trachea. The œsophagus I have not known to be pressed upon by an aneurism of the arch; but of the descending aorta I have known several instances in which dysphagia was induced, and the disease sometimes terminated by the sac bursting into the tube. The pressure on the trachea is often considerable, and produces great alteration in the voice, and difficulty of breathing. In these cases the cause of the impediment to respiration is not always clear; and the sensations of the patient induce him to refer the uneasiness he experiences to the region of the larynx. Instances have occurred in which the surgeon has been induced to perform the operation of bronchotomy, but without affording any relief to the patient. A lady, who had for some weeks suffered from some slight impediment in breathing, gradually began to lose her voice, until she could scarcely speak in a tone above a whisper. Her respiration at the same time became so difficult that she was in dread of suffocation, and it became a question whether she might not be relieved by an opening in the trachea. For this purpose I was requested to see her; she seemed to labour under a most distressing sense of suffocation, and was hardly able distinctly to articulate. Her whole distress was referred to the larynx; where, she said, she was certain the difficulty would be found. The larynx appeared healthy, and the pharynx also; and there appeared to be no obstruction at any part of the tube, as far as examination could discover: the pulse was quick and jerking, but small. On examination of the neck there appeared to be a slight undulation in the inferior thyroidial veins, which appeared to be distended. This vibrating state of the blood in these veins immediately suggested the idea that some impediment must exist to the return of blood in the chest. On placing the hand on the left side of the sternum a distinct impulse could be felt, and

the ear confirmed the existence of aneurism. In a day or two this lady suddenly died. On examination a large aneurismal tumor was found pressing on the trachea, just above its bifurcation, so as considerably to lessen its diameter: it had burst into the right cavity of the pleura. The parts are preserved in the museum. This vibratory motion of the veins in the neck, or rather of their contents, cannot, as you will readily perceive, depend on the contraction or motion of the heart: when the heart contracts, it of course diminishes its volume, and therefore cannot, by its pressure, force the blood back into the veins so as to dilate them: this can only arise from the increase of some tumor when the heart expels the blood from its ventricle, and from the pressure which the tumor thus exerts on the surrounding large veins.

The same peculiarity of form attends the aneurism of the posterior part of the arch as of the anterior part, which gives rise to the *arteria innominata*: it appears to spring from the carotid, and is liable to be mistaken for a disease of that artery. In the present day, when the operation of tying the vessel beyond the sac is recommended, the distinction is by no means unimportant. I may bring to your recollection the case of Mr. Burns, of Glasgow, who wrote to Sir A. Cooper to ascertain his opinion respecting the propriety of tying the carotid in such a case: the caution given in answer was shewn to be not unnecessary, for, on inspection after the patient's death, it proved to be an enlargement of the arch of the aorta. Indeed, in one of the reported cases in which the carotid artery has been tied beyond the tumor, I could not persuade myself that the disease was of the carotid, nor could I convince others that the aorta was diseased: how far the death of the woman proved my suspicions to be correct I cannot say, as I have not had the opportunity of inspecting the parts.

The formation of aortic aneurisms, it is well known, with very few exceptions, originate in a disease of the middle and internal coats, and a consequent dilatation of the artery in the form of a pouch: this gives rise to the term aneurism by dilatation, of which nature aortic aneurisms always more or less partake. Without entering generally into this subject, I will mention a singular exception to it. A woman, under the care

of Dr. Laird, whose respiration had not been perfectly free, was suddenly seized in the night with a fit of syncope, from which, by the aid of stimulants, she revived: on the following morning she again fainted, but all attempts to restore the heart's action proved unavailing. On examination *post mortem*, an aneurism was found to have burst into the posterior mediastinum (the occasion probably of her first syncope), and from thence into the cavity of the left pleura, by which she was destroyed. The aneurism, which was seated at the posterior and lowest part of the arch was not larger than a full-sized walnut, and was nearly filled with laminated coagulum. On cutting open the artery, the coats of the vessel appeared healthy, and instead of finding a free opening of communication between the sac and the artery, two small openings, only sufficient to admit a probe, and about three-quarters of an inch distant from each other, could be discerned. The cause of this singular deviation from aortic aneurism was not at first readily understood; such apertures it was not likely could be formed by an idiopathic disease in the coats of the vessel; and the sound state of the aorta resembled the condition of an artery that is the seat of spurious aneurism from wound. On dissection the left bronchus presented one or two small, but sharp, bony points attached to its rings, upon which the aorta was forced at each contraction of the heart, and thus its coats became gradually pierced by an ulcerative process. It appeared that the cellular membrane surrounding the artery formed the sac of the aneurism. The preparation is in the museum.

In the case of Riley, there are reasons for believing that the affection is one of the aorta, and not confined to the arteria innominata. In the cases which I have seen, in which the disease has been confined to the latter vessel, the tumor has been more circumscribed, nor have the parietes of the vessel yielded so early as appears to have been the case in this instance; for although he has noticed the swelling only three weeks or a month, at which time the tumor was not larger than a hazel nut, the joint of the clavicle is altered in form, and the parietes of the chest are undergoing absorption. The latter circumstances render it probable that the tumor, which has made its appearance, is only part of another

and a larger aneurismal swelling within the chest; for it is not usual for aneurism of these arteries to yield until long continued distention has first dilated the coats of the vessel, and then caused them to give way by progressive ulceration. Another circumstance favouring the opinion that the aorta is affected, is, that the stethoscope, when applied an inch *below* the tumor, communicates an impulse and a sound, which it fails to do equally distinctly when applied an inch to the *left* of the tumor; the former situation points more to the aorta, the latter to the arteria innominata. The probability, however, is, that the latter vessel is implicated more or less in the aneurismal swelling; for a tumor arising from that part of the aorta, and appearing in the site of the arteria innominata, would press upon it, and impede the stream of blood through it: the artery must be free from pressure, for the pulse in the right wrist is as full and as strong as in the opposite arm.

There are two questions remaining for our consideration; first, whether the operation of tying the vessel beyond the aneurismal sac be entitled to that consideration which its first advocate conceived it to be; and secondly, whether, supposing this to be an aneurism of the arteria innominata, it is a case adapted to the operation.

The first I shall not, as far as my opinion goes, hesitate to decide in the affirmative. We should not hastily discard a mode of operating because it may have been performed in cases in which the operation was either not required, or entirely inadmissible; but it is, perhaps, more charitable to pass over these cases, if the report of them in the journals be correct; I may, however, observe, that while, by their want of success, they have failed to raise it in the estimation of the profession, they certainly leave the merits of the operation untouched. One of the reported cases, as I have observed, I saw before the operation was performed, and gave an opinion unfavourable for the operation, as the aorta itself appeared to be more affected with disease than the carotid. The principle of the operation I cannot but consider to be perfectly just in a pathological point of view: if Mr. Hunter's operation of placing a ligature upon an artery at a distance above the sac allows its contents to coagulate, even while a stream of blood is slowly

passing through the sac—for it is well known that the ligature does not entirely check the circulation through the sac—*à fortiori*, there is reason to believe that a ligature placed upon an artery immediately below or beyond the tumor will place the contents of the sac more at rest, and thus more effectually succeed in curing the disease; it is, in short, putting the sac in the condition of the artery of a stump, in which coagulum forms as high as the first considerable branch. But to ensure its success, great judgment must be exercised in selecting a fit case; if a branch be allowed to intervene between the ligature and the sac, the operation in effect is useless; for as soon as the circulation is checked through the main trunk, the blood immediately finds a passage through the enlarging collateral branch, and thus establishes a current through the sac, which is fatal to the success of the operation. This would form the objection to the operation in the present case; the tumor extends to the scalenus muscle, and the artery must therefore be secured beyond it, which would leave a current passing through the numerous branches given off by the subclavian, between the ligature and the sac. The circumstances of M. Dupuytren's operation were different; the ligature was placed as close to the tumor as possible, so that the blood in the sac must have been nearly at rest; and had the case been well managed in its progress, it is probable that it would have been successful. Principle is all I can offer in favour of the operation, as it rarely happens that facts in its illustration present themselves; the only preparation in our museum of an aneurism having been formed between a ligature and the heart, is in a case in which the external iliac was tied for femoral aneurism. The patient died several weeks after the operation from acute rheumatism of the joints; and on examination, a small aneurism was discovered in the external iliac artery, exactly opposite to the origin of the internal iliac: the sac is free from coagulum, although the coagulum in the artery extends up to it, but the flow of blood through the internal iliac must have prevented that in the sac from being sufficiently at rest for its gradual coagulation.

I will conclude by observing, that the principle of the Hunterian operation has been so long recognized that it is

surprising to find it stated by the author of a late work on Aneurism, as something like a discovery, that the blood in the sac is not entirely at rest, but still flows in a slow but regular stream below the part when the ligature is applied. The fact of a distant ligature allowing the blood in most cases to flow slowly through the sac, and not entirely stopping the current, is stated by Sir E. Home, in his account of Mr. Hunter's operation, and also by Mr. Hodgson, in his treatise on Diseased Arteries, and is the universal doctrine of the day.

OBSERVATIONS

UPON

CONGESTION OF THE BRAIN,

AND

Upon Deficiency of Blood in that Organ.

BY R. R. ROBINSON.

(For the London Medical Gazette.)

THERE are, perhaps, no two diseases which require to be more clearly distinguished, and in which a correctness of diagnosis is more important, than in apoplexy and syncope. Although the general outline of these two affections are sufficiently distinct, the full and slow pulse, the stertorous breathing, the gradual and ultimately complete loss of sensation and motion, foaming at the mouth and redness of countenance observable in apoplexy, together with the apoplectic make, being directly opposed to the death-like paleness and coldness of skin, the feeble and rapid circulation, and, in the more partial cases, the feeling of faintness, yawning, and nausea, remarkable in syncope; yet, that the two diseases now under consideration not only may be but have been mistaken, and that anomalous cases occasionally occur, are inferences fairly, I think, to be drawn from the sequel of this paper.

I shall now, therefore, relate two cases of congestion of the brain, upon which I shall offer a few remarks, and conclude with one whose nature, in my opinion, is decidedly the reverse of these.

CASE I.—Oct. 8th, 1827, eleven A.M. M. Kelly, æt. 52, subject to gout, had a severe attack last winter, since which his constitution has been very much

shattered. He has had eruptions and ulcerations of the scalp, evidently of a scrofulous nature, attended with loss of appetite, coated tongue, great prostration of strength, and feeble pulse. Took alteratives and tonics of various kinds, and went to the sea-side, without any benefit. There is now a circular ulcer in the centre of the forehead, which discharges freely, and from which a slough has just come away. He had a rigor on the 6th instant, and has since felt chilly at times; and to-day he has felt a pain in the abdomen, which he has frequently experienced before, but it has always yielded to rhubarb.

R Pulv. Rhei. Magn. Carb. a. gr. xx.
Aq. Piment. ℥j. Træ. Rhei, 3ss. fiat
haustus statim sumend.

7 P.M.—Pain continues, and is now attended with vomiting; abdomen tender on pressure; very restless; skin hot; pulse soft and small; no motion.

Hirudines, viij. epigastrio; enema commune statim; salts and senna, p. r. n.

Oct. 8th, 12 P.M.—Took but a small quantity of salts and senna with peppermint water, which was immediately returned, after which he became more restless, and would not answer when spoken to. Soon after this he was perfectly comatose, pupils widely dilated, and not sensible to the light of a candle; breathing short and sonorous; legs drawn up; he occasionally tossed about in the bed. Pulse full, bounding, about 70. Skin covered with perspiration. No motion.

V. S. ad ℥xx. Vesicatorium nuchæ. Lotio frigida capiti Sinapium cruribus;
Enema Cath. 2 quaque horâ.

Oct. 9th, 8 A.M.—Blood not buffy; very restless; not so completely comatose, but not sensible to surrounding objects. One motion; pulse much diminished in power.

8 P.M.—Sensibility has so far returned that he knows his wife, but he is at times quite confused; has taken a cup of tea, which has not been returned; pupil contracts on exposure to light; scalp hot; two motions; pulse as before; tongue and lips dry.

Hirudines, viij. temporibus.

Oct. 10th.—A restless night; quite sensible now, though occasionally he wanders; pulse soft, and rather stronger; tongue clean and moist. Has taken

Cal. gr. v.; Pulv. Scamm. co. ℥j. and has had one motion.

Rep. Hirud. Enema et Lotio.
Ant. Tart. gr. $\frac{1}{8}$ sextis horis.

October 11th, morning.—No sleep; two motions; sensible; some tenderness on pressing the abdomen; pulse soft; tongue dry.

Evening.—Nine liquid motions, in colour and appearance resembling walnut-pickle. Pulse steady; skin dry; tongue white and moist; hiccup.

[From this time he gradually improved. The motions, however, continued dark, and he was much troubled with hiccup: the remedies consisted chiefly of calomel and purgatives.]

October 28th.—Convalescent.

November 20th.—Has had, for three successive evenings, a severe rigor, with pain in the back, followed by heat and colliquative sweating, which has reduced him much.

Quin. Sulph. gr. ij. 6tis horis.

Nov. 22d.—No rigor since 20th. Bowels open; motions green; hiccup again frequent.

December 8th.—Gains strength; belly soft and open; no hiccup; pulse natural.

Omit Med.

December 16th.—Well.

CASE II.—February 10, 1829.—John Prior, æt. 20, had an attack of pneumonia, accompanied with hæmoptysis, last September, which was entirely removed by bleeding, digitalis, and small doses of mercury, and he continued quite well until a month back, when he again felt some pain and tightness about the chest, with cough, but did not apply for advice till yesterday, when he complained chiefly of cough. He was accordingly ordered low diet, and to take two grains of blue and two grains of the squill pill at bed-time, and small doses of sulph. of magnesia and tartarized antimony. So far, however, from paying attention to diet, he ate for dinner yesterday some boiled beef and cheese, and afterwards several chesnuts. Soon after this the cough increased, and continued through the night. Great pain was experienced at the epigastrium, and he spit up a tablespoonful of frothy florid blood. On visiting him at half-past 9 A.M. this day, I found him lying in bed with his head raised, perfectly in-

sensible, pupil widely dilated, and scarcely sensible to light. When spoken to he made no answer; breathing short and laborious; frequently gasped for breath; a constant, short, dry cough; frequent hiccup, and spasmodic state of diaphragm; convulsed at times; skin cold; frequent belching; pulse at wrist small and compressed; respiratory murmur clear at the upper part of the lungs; the heart's pulsation scarcely heard, from the convulsed state of the diaphragm. Sipping cold water seemed for a time to allay the cough. A vein being opened, not more than ℥ij. of blood flowed, and the pulse was rather more expanded afterwards. In about two hours time, ℥ij. more blood were abstracted, and his face and neck were sprinkled with cold water, by which he seemed a little refreshed. About half-past 11 A.M. he first answered questions. He then sipped some warm brandy and water; soon after which, the spasmodic state of the diaphragm and cough ceased, the breathing became free, his sensibility perfect, and the pulse beat 84 times in a minute, softly and regularly.

R Olei Succini, gtt. x. Træ. Opii, gtt. xxxx.
Decocti Avenæ tep. ℥xvi.
Fiat enema statim injiciendum.

1 P.M.—Perfectly sensible; complains of a sensation of dragging at the chest, but little cough; breathing free; no head-ache, but some pain on pressure at the epigastrium.

Ol. Crotonis, gt. i. statim.

Vesicatorium sterno. Enema commune.

10 P.M.—Quite easy; disposed to sleep; some heat of skin; thirst; pulse small and feeble.

Magn. Sulph. 3j. Ant. Tart. gr. $\frac{1}{16}$ ex Aq. Menth. 6tis horis.

February 11th.—A restless night, but little cough; skin warm; pulse soft, regular, 84; tongue clean and moist; a feeling of faintness an hour ago.

February 14th.—Dyspnœa, cough, and fever, entirely gone; going into the country for change of air.

March 10th.—Returned from the country quite well.

I have been induced to relate these cases principally to illustrate, as they appear to me very satisfactorily to do, that state of apoplexy dependent upon congestion, rather than on rupture

of the cerebral vessels, of which the rapid return of sensibility in both is a sufficient proof; and also to contrast them with the case that is to follow. I think, however, it will be admitted that they are interesting in another point of view, as shewing how the brain may be secondarily affected, and yet be the organ to which our attention must be chiefly directed.

The two cases, however, are in some respects different. The first is one in which the cerebral congestion cannot be at all questioned: the slow, full, and bounding pulse, the stertorous breathing, and the good effects of venesection, clearly indicating such a state of the brain. It may be asked by some, upon what this state of the sensorium depended; whether upon the irritation of the scalp sores, or upon inflammation of the liver?—of which the fever, the pain in the left hypochondrium, vomiting, the obstinate hiccup, the walnut-pickle-like appearance of the motions, and subsequent ague, are sufficient indications. I should myself incline to the latter opinion, more especially as there was no head-ache nor any sudden alteration in the look of the sores; as the coma came on suddenly, soon after the abdominal symptoms manifested themselves, and as some degree of delirium returned from time to time, and varied with these symptoms, and as I have seen other cases of inflammation of the liver and thoracic viscera attended with a similar state of the brain.

The second case, from the smallness and compressibility of the pulse, the coldness of skin, and the gasping for breath, approached in character more to syncope than apoplexy; yet, from the complete insensibility, the cough and hiccup, together with the hæmoptysis, it appears to me most probable that the injudicious diet, not being digested, had irritated the diaphragm, and prevented its free descent, and this impeding the heart's action, produced congestion of that organ, which was followed by congestion of the lungs, especially towards their lower part, and ultimately by congestion of the brain; and therefore perhaps it approaches more to the state of the liver and thoracic viscera in the cold stage of an ague than either to apoplexy or syncope, strictly so called.

This case also is further interesting,

as giving proof that, if we can find out the cause of a diseased action, and can remove that, the cessation of the effect will soon follow. The brandy and water stimulated the stomach to get rid of, or remove further from the diaphragm, the irritating ingesta, and consequently the spasmodic state of that muscle ceased; the heart's action became more regular, the lungs acted more freely, the blood was more thoroughly decarbonized, the circulation was more natural, and the congestion was removed from these organs as well as from the brain, whose sensibility was soon completely restored.

The oppression of the brain in this case was so great, that a distinguished physician who saw it, thought a vessel had given way; but the rapid return of sensibility at once puts an end to this opinion.

CASE III.—Oct. 25, 1828. Thomas Farley, 60. I was requested to see this man at 10 P. M. this day, who was reported to have fallen down in a fit. On my arrival I found him in bed, perfectly sensible, but exceedingly restless and fidgety; he was constantly yawning; his pulse was imperceptible at the wrist at first; his skin cold, and covered with a clammy sweat, especially about the feet; face remarkably pale; tongue exsanguine and tremulous; tremor also in the muscles of the extremities; respirations short, sonorous, and forty-four in a minute; heart's action slow and laboured.

Upon inquiry I learnt the following particulars:—that he had always been a remarkably healthy man, with the exception of a short dry cough, and some dyspnoea, for the last two winters, for which, however, he did not apply for medical advice: he had also a slight attack of this kind at the commencement of last August, for which he took some medicine, by which he was much purged, and which weakened him greatly; but by mild bitters his strength was soon restored, and by the 12th of that month he was quite well, and has continued so ever since, until 2 P. M. this day, when he was suddenly seized with giddiness and loss of recollection, and upon coming to himself he found that he was in “a doctor's shop”; that he had been bled; that the gentleman said that at first no blood flowed, but that as soon as it did, he went into another fit, and was bathed in perspiration. He

told me also that he had been walking about all the morning; that he had taken nothing since his breakfast, which consisted of bread and butter and tea, but half a pint of porter and one glass of grog at 11 A. M.

After some brandy and water were given him warm, and fomentations applied to the feet, the pulse became perceptible for a few beats, and then flagged, the yawning went off, and the skin, excepting about the feet, again became warm.

I left him for the night, with directions to take some beef-tea, and small quantities of brandy and water if he again became cold; to continue the fomentations; and to take 1½ oz. of camphor mixture every four hours.

26th.—Feet became warm soon after the bottles were applied, and he then slept for two hours. No pain; giddy at times; breathes freely; skin quite warm, and still pale, but more steady; pulse small, regular, about 100; four motions; urine clear; has taken beef-tea occasionally; muscles of the extremities still tremulous.

R Pulv. Doveri, gr. vi. Liq. Amm Acet. 3iv.
Mist. Camph. ʒj. sextis horis.

27th.—No complaint, giddiness gone, slept well, no motion: pulse small, regular, but quick; feels weak.

Rep. Mistura.

Pulveris Jalapæ, gr. x. primo mane.

30th.—Convalescent, but weak.

Infusi Cascarillæ, ʒiss. ter die.

Nov. 10th.—Quite well.

What state this man was in when first attacked it is impossible for me to say, as I did not see him; but from the account afterwards received, of his fatigue, the paleness of countenance, the coldness of the extremities, the cold sweat, the imperceptible or only occasionally perceptible pulsations of the radial arteries, the constant yawning, the rapid breathing, and the good effect of stimuli, there can be little doubt, I think, that there was a deficiency, rather than fullness, of blood, not only in the brain, but in the system generally, and consequently bleeding, so far from being beneficial, was decidedly injurious; for I am persuaded that the state of collapse in which I found him, was by no means void of danger.

Cooper's Row, July 20th, 1829.

BELLADONNA — A PRESERVATIVE
AGAINST SCARLATINA.

*To the Editor of the London Medical
Gazette.*

SIR,

IF you should consider the following account of the effect of belladonna in resisting the contagion of scarlet fever worthy of insertion in your truly valuable Journal, we shall feel obliged by your early attention to it.

We remain, Sir,

Your obedient servants,

TAYNTON & WILLIAMS.

Bromley, Kent, July 23d, 1829.

During the months of April and May the scarlet fever was very prevalent in this town and neighbourhood, and in many cases it proved fatal. Our attention was called by a friend to a notice in the *Lancet* of the 2d of May, "on the prophylactic powers of belladonna against scarlet fever, by M. Hufeland."

We were at that time attending in a boarding-school, where the disease had attacked twelve of the boys, many of whom had been most dangerously ill, but none had died. There still remained several boys (perhaps twenty) who had not taken the infection; also four young children of the master's, and several servants.

We immediately commenced the use of the belladonna, in the exact manner and dose advised by Hufeland. *Only* six or seven persons in the house took the disease *afterwards*, and in every instance it assumed the mildest form.

In another small school we were called to visit a child about two years old, who had been attacked the evening before. The disease was of the most malignant character, and the child died on the following morning, the third day from the attack.

The house is a very small one. There were in it three other young children and five boarders, and a servant girl. The belladonna was faithfully administered, and not *one* individual took the disease.

We will not offer any conjecture on the *modus operandi* of the belladonna, or whether it did or did not prevent the other members of these families from taking the disease. The facts are stated exactly as they occurred, and we

entreat our medical brethren to make trial of the belladonna whenever a favourable opportunity offers.

The following is the manner of giving the medicine. Three grains of extract of belladonna dissolved in three ounces of proof spirit. Of this solution as many drops are to be taken as the patient is years old, twice a-day.

As our readers may not be fully aware of the circumstances alluded to in the above paper, we subjoin some observations, on this subject, made by Professor Koreff, in a letter to the late M. Laennec, published in the *Bulletin des Sciences Medicales*:—

"Observation clearly proves," says he, "that the belladonna, taken for some time, either in powder or in extract, produces, especially in infants, a redness of the skin, which is sometimes transient, but at others more durable; dryness of the mouth, with a sense of heat in the throat; dilatation of the pupil; anxiety; and occasionally swelling of the sub-maxillary glands: symptoms having a great resemblance to those which accompany the eruption of scarlatina. The effect of the belladonna has also this in common with scarlatina, that neither of them produce the redness of the skin invariably, whilst the symptoms about the throat are always present. I confess to you, however, that all these analogies did not appear to me sufficiently strong to persuade me that in this plant was really to be found a preservative against scarlatina, similar to that which the cow-pock affords against variola. It was not till I had received the authority of the celebrated Soemmerring, who informed me that he had obtained the most satisfactory results with it when the disease raged epidemically, that I determined to employ it. This malady, accompanied by the most unfavorable symptoms, and having entirely changed its usual character, was at that time producing ravages almost as fatal as the contagious typhus. I then, for the first time, had the happiness to protect from this dreadful contagion almost all those who took the belladonna with a little perseverance, and of these there were many thousands. Since that time I have never lost sight of this discovery, which becomes the more valuable as the scarlatina has increased during the last

thirty years, both in violence and extent, in many countries; and I have always found the same effects in different climates, and in epidemics of opposite characters. Many other physicians have equally confirmed the preventive powers of this plant, and the German Journals are daily filled with proofs of a benefit which, with respect to some countries, equals that of vaccination. In France, the capital and the provinces of which appear less subject to these fatal epidemics than Germany, Switzerland, the Tyrol, Poland, and the north in general, less attention has been given to this discovery, and it has been rejected,—it must be said too lightly, and without any sufficient examination, as may be seen in the article *Belladonna* in the *Dictionnaire des Sciences Medicales*. I only remember a single observation on this important subject, by Dr. Meglin*, who gives an account of a trial which he gave to this preservative during an epidemic of scarlatina at Colmar, and which confirms all the assertions of the German physicians. The absence of present danger is, perhaps, the cause of this indifference towards a discovery, which, important in itself, might also be fruitful in results applicable to other diseases. At present, however, I shall confine myself to an account of the results which have been ascertained, (by repeated observations, and by a great number of individuals placed in very different circumstances), without incurring the reproach of having proceeded in a manner not sufficiently rigorous.

* * * *

“The powder mixed with sugar, or the extract made very carefully from the juice of the recent plant, are employed after the following formulæ:—Extract of belladonna, three grains, dissolved in an ounce of cinnamon water. Powder, or root of belladonna, two grains, mixed with drachms of white sugar, divided into sixty doses. From half a dose to a whole one is given to a child, from six months to two years old, four times a-day; to children from three to six years old, from a dose to one and a half; to those from six to nine, two, to two and a half; to those from ten to twelve, three, to four and a half. Of the solution, a drop is given for every year of the child's age, once a-day and fasting. Observation has shown that,

when the epidemic is very fatal, or the intercourse with the patients very frequent and intimate, it is prudent to increase the dose a little. It has not yet been possible to determine, in a satisfactory manner, the length of time which is necessary to eradicate, by this remedy, the susceptibility of the contagion. Every thing leads us to believe that the remedy, if used during a time too short to ward off the contagion, moderates very much the malignity of the disease. We know for certain that the remedy does not permanently overcome the disposition to scarlatina; and it is necessary to resume its use on every recurrence of an epidemic. We have always observed that the most intimate communication with the sick does not produce the disease, provided the medicine has been employed eight or nine times previous to being exposed to the contagion, and continued up to the period of desquamation; a circumstance very important to nurses. It appears more certain to begin with rather strong doses, in order to guard against the first impression of the contagion, and to diminish the quantity after a few days. No sensible effect has been observed to follow the continued use of this small quantity of belladonna. Up to the present time, neither season nor locality, nor any other circumstance, has appeared to diminish the preservative effect of this plant.

* * *

“Do not believe, my learned colleague, that these results have been too lightly deduced, or from a small number of individuals, or from epidemics of little violence. It is from entire provinces,—from cities affected with this terrible scourge,—from epidemics the most fatal, in all seasons, and in localities the most diversified,—on individuals of every age and of every condition, that observations have been made with the greatest accuracy, and have led to the above results.”

OBSERVATIONS ON LITHOTOMY:

Being the Substance of a Clinical Lecture

By BRANSBY B. COOPER, Esq.

[Concluded from p. 277.]

At the conclusion of my last lecture I had stated to you in general terms all that I deemed necessary to be said respecting the diagnosis and prognosis in

* Nouveau Journal de Medecine, 1821.

cases of calculus or stone, and was proceeding to describe to you the operation as performed with the scalpel, or some other instrument of a similar construction, having declined to enter upon any discussion upon the merits or demerits of the gorget; I shall first, therefore, point out to you the various steps of the operation as performed in the ordinary way, with the curved staff and scalpel. In performing the operation in this way, your first object is to introduce the staff through the urethra into the bladder, and, without offending your anatomical knowledge by any minute detail, I would observe, that there is occasionally more difficulty attending this step of the operation than many of you may be prepared to believe, and this too arising rather from a want of practical tact than from any defect in your anatomical knowledge. The whole secret consists in carefully avoiding every attempt at violence, for the introduction is to be effected literally "*arte non vi*," bearing this in mind, never deviating for a moment from observing the greatest gentleness, unless indeed a stricture or other mechanical obstruction interfere, you will scarcely fail in accomplishing your object. Having done this, the staff is to be held by an assistant, in order that you may effect the second step of the operation, which consists in cutting down upon and fixing the point of the knife in the groove of the staff. By your first incision, commencing about half an inch below the arch of the pubes, and extending to a point midway between the anus and tuberosity of the ischium, you ought to divide the common integuments and superficial fascia of the perineum. By this incision you form an opening between the accelerator urinæ and erector penis muscles, having cut through the transversus perinei. The urethra, now exposed, is to be pierced by the point of the knife, so that the latter may enter the groove of the staff. The operator now taking the staff into his own hand, depresses it, and thereby forms a direct line between the external incision and bladder, and thrusting the knife onward along the groove, makes by the direction of his knife a lateral incision through the deep fascia of the perineum and the prostate into the bladder; he then, in withdrawing the knife, enlarges the incision laterally, or rather downwards and outwards, to such an extent as shall

seem to him necessary for the extraction of the stone. The operator next passes the fore-finger of the right hand through the wound into the bladder, in order to satisfy himself of the sufficiency of his incision, as well as of the actual situation and size of the stone. Having satisfied himself on these points, the staff is to be withdrawn, and he next proceeds by means of the forceps to lay hold of and extract the stone. This part of the operation being, as you perceive, purely mechanical, is easy or difficult according to the size and situation of the stone, but ought at all times to be effected with as little violence as possible. No precise or invariable rule therefore, either with respect to the size or form of forceps, can be laid down, but having had the good fortune to grasp the stone in such a manner that the forceps holding it can be withdrawn without much physical force, the stone is to be extracted by a slow, steady, and continued force—a force proportionate indeed in some measure to the size of the calculus, and consequent expansion of the forceps. So much, then, for the operation as performed with the crooked staff.

The peculiarity, or rather, I might say, the supposed advantages of the straight staff, are, that by its necessary depression it raises the prostate gland, thereby increases the space between the latter organ and the rectum, and consequently obviates the necessity of dividing the bulb of the urethra; whilst, at the same time, it diminishes the risk of wounding the rectum—an accident by no means of unfrequent occurrence in this operation. I am disposed to admit and appreciate all this, but have to point out to you, what appears to me at least, another practical advantage, although its observance, indeed, may subject you to the imputation of unseemly delay: what I mean is this—I attach some importance to avoiding the division of the artery of the bulb, and on that account endeavour to pierce the urethra in the first instance beyond the bulb. This necessarily occupies more time, in consequence of the greater depth into which I proceed to open the urethra; but in my humble opinion, by affording a greater security against hæmorrhage on one hand, and infiltration of urine on the other, the advantages more than compensate for any increased delay, however much it may detract from the *eclat* of the operation itself. Without

entering upon a consideration of the unpleasant circumstances of the accidental breaking of the stone, and consequent employment of the scoop, syringing the bladder, and other such measures, I shall merely caution you against removing the patient from the operating-table without satisfying yourselves, by careful examination with the finger, with the sound, or with both, that no calculus, or portion of calculus, remains behind.

I shall only observe, with reference to the after-treatment in general, that you will do well to allow the thighs of the patient to remain apart, by which you will be much less likely to have an accumulation of blood either within the bladder or neighbouring parts; accumulations which, by the irritation they produce, not unfrequently give rise to unpleasant constitutional symptoms.

In applying what has been said to the cases which have recently occurred, I may observe, that in reference to Perring, from whom I extracted a portion of bougie and a quantity of calculous matter, I founded an unfavourable prognosis upon his previous history and actual condition at the time. He was a smuggler, and had been so for many years, living in a state of constant excitement, greatly aggravated by an habitual indulgence in the use of spirituous liquors; he was, moreover, much depressed by fearful forebodings as to the result of the operation, which is ever to be regarded as an unfavourable omen. We accordingly found that although no violence whatever was inflicted during the operation, which, upon the whole, he bore manfully—although no hæmorrhage occurred—although the case proceeded apparently favourably from the Tuesday to the Friday—and although the post mortem examination displayed a free and fair incision, without the least damage to the surrounding parts, yet not the slightest attempt had been made by the constitution to repair the injury, the parts presenting precisely an appearance as if they had been divided an hour before the inspection of the body took place. The state of his kidneys, indeed, afforded a further evidence of constitutional atomy.

With respect to Willis, his case was so unfavourable that I believe there existed but one opinion as to the probable or almost certain result: an

opinion, indeed, backed by that of Sir Astley Cooper, and so deeply impressed on my own mind, that it was with the greatest reluctance, and only at his own urgent entreaties, that I consented to perform the operation. He had long been an extreme sufferer, was nearly 50 years of age, had laboured under stricture of the urethra for 19 years, and had manifestly extensive disease of the bladder, sufficiently evinced, as you saw, by the discharge of offensive purulent matter during the operation, and proved by the inspection after death. We accordingly found that, in his case too, although he survived from the Tuesday to the following Monday, little or no attempt at reparation had been made of the wounded parts. [Mr. Cooper then exhibited the morbid parts, and read the report made by Dr. Hodgkin, who examined the bodies*.]

REMARKS

ON

A PECULIAR CLASS OF DISEASES RESEMBLING INFLAMMATION.

BY MR. GEORGE NEWSTEAD.

A NUMBER of cases have occurred in my practice† during the last three or four years, which, with all the external characters of active inflammation, have not been relieved by bleeding, and, in fact, could not bear it to any great extent. The form chiefly assumed by the disease, when I first observed it, was that of pleuritis. Cold chills or shivering—uneasiness in the back and limbs, and frequently vomiting, were succeeded by very acute pain in the side. The tongue had the appearance exhibited in typhus mitior—the pulse was sometimes accelerated, but very often was not disturbed in the beginning—the secretion of urine was remarkably scanty, very high-coloured, and deposited a thick sediment. It sometimes terminated in three or four days with profuse sweats, and sometimes in a week or ten days by expectoration, tinged often with blood. The pain was

* We gave an account of the post mortem appearances found in the body of Perring, in our report of his case, pages 254, 255. The body of Willis was not examined till after it had been removed from the hospital. We have inserted, among our Hospital Reports, Dr. Hodgkin's account of the dissection.—ED. GAZ.

† At Howden, Yorkshire.

so urgent, and the breathing so obstructed, that I did not hesitate to use the lancet; but the first bleeding generally put me upon my guard. I was astonished at the small quantity which commonly flowed before syncope was produced, and also at the slight relief of pain, even where larger abstractions could be borne. Cases like peritonitis began to occur, and I then found, that whether the patient complained of the chest or abdomen, the pain was not confined to one part. Upon examining those complaining of the chest, there was great tenderness to the *touch* there, (a circumstance I never remarked in inflammation of the lungs or pleura) and not only there, but upon the abdomen and very often down the back; and those who said the pain was in the abdomen were affected, in like manner, by pressure on the chest and back, as well as the belly. In some, even the arms and thighs were affected; and whatever part was touched, they shrunk like the subject of acute rheumatism upon handling an inflamed joint. This diffused pain upon pressure, and the diminished secretion of urine, I fixed upon as the characteristic symptoms of the disease. Although the region of the kidney was usually pointed out as the seat of the most acute pain in the abdominal disease, and the secretion of urine was so much disordered, there was not that frequency of making water, and pain in voiding small quantities, which mark nephritis. The state of the bowels was various—frequently diarrhoea came on with green stools, or a discharge of bloody mucus; but, as calomel was freely given, I attributed these symptoms to its use. One young man, however, before any medicine was given, had frequent discharges from the bowels of a thin bloody serum, without tenesmus, and totally different from any thing dysenteric. I observed some, where the chest was chiefly complained of, spit up the same kind of serum, like bloody water. The stomach was often irritable throughout the abdominal disorder, and a green fluid was occasionally discharged. I felt an awful responsibility at first, when I dared to treat this complaint without, or with very little, depletion; for patients themselves, identifying what they felt with what they had heard of inflammation, would ask to be bled, but I was alarmed by the exhaustion I had seen follow,

and I never, except in two cases, ventured upon more than one bleeding, trusting afterwards to leeches, a dozen at a time. My reliance was upon opium and calomel, or mercurial frictions. I was partly encouraged to withhold the lancet by the state of the pulse, which was often not above 80 and natural to the feel, when the chest, back, and abdomen could not be touched without agony, and even the weight of the bed-clothes was irksome; for although I am aware that fatal inflammation of the bowels may exist without an accelerated pulse, I fancy that, commonly, it is when it proceeds from some mechanical obstruction, and that in pure enteritis or peritonitis there must be a quick pulse, though the feel may be variable. The pulse did not often continue in this state—it generally got to be 100 or upwards after two or three days, when the febrile disorder, which seemed to me to modify and give a peculiar character to the inflammatory symptoms, had time to develop itself. My cautious practice has been successful. Out of a number of persons afflicted in this way, I cannot say how many, but I can readily bring forty to my memory, three died. Two of these had been freely bled, and the third was a woman seventy-eight years of age. Within the last month I have treated two cases successfully, even without leeches. I will give you a daily report of one of them.

Jane Cotham, æt. 61. July 7, 1829. Attacked suddenly after tea this afternoon with excruciating pain all over the abdomen, and vomiting. Eight o'clock, P.M. Complains of great pain in the abdomen, which is very much increased upon pressure—does not mention pain elsewhere; but, upon examination, the whole of the left side of the chest, as high as the axilla, and the back, are as tender to the touch as the abdomen—pain came on suddenly, but she has felt chilly and not very well all day—has been uneasy and stiff in her back and limbs two or three days—has never been subject to any spasmodic affection—pulse 72, with a sinking feel; tongue pretty natural; bowels moved both yesterday and to-day. Warm bath; two grains of opium immediately.

Pulv. Ipecac. c. gr. x. Hydrarg. Submur. gr. ij. cum dosi mist salin. 4tis horis postea. Ol. Ricini, ℥j. primo mane. Rub the parts affected, as much as can be borne, with camphorated oil.

July 8th, 10 o'clock, A.M.—Is easier. The pain on pressure continues, however, particularly acute on the left side of the chest, and the right side of the abdomen; cannot take a full inspiration; has no cough; urine said to be very little in quantity; no stool; has not yet taken the oil; pulse 72, without any sinking; tongue furred. Ordered to take the oil and a black draught every four hours after, until the bowels are opened.—Eight o'clock, P.M. Opening medicine has not operated; does not complain much when she is still, but the whole of the abdomen is exquisitely tender to the touch, also both sides of the chest as high as the armpits; can bear pressure now upon the back; pulse 65; tongue a little moister; urine in very small quantity, but nothing particular in its appearance; has vomited after taking an opening draught.

July 9th.—Has been purged freely; does not complain of pain; can bear pressure tolerably well upon the abdomen, excepting the right side, which is still tender; has a little tenderness on the right side of the chest, but shrinks from the slightest touch on the left side. Pulse 86; tongue loaded with a moist fur in the middle; evidently febrile action; has continued the calomel and comp. powder of ipecac.

July 10th.—Is easier; has slept well; bears pressure on the abdomen without pain, but it feels hard, and as if the muscles were spasmodically contracted; some soreness to the touch all over the chest. Pulse 80; gentle diaphoresis; urine exceedingly scanty, depositing a thick sediment; tongue rather improving, dry and foul in the middle; bowels open; has vomited repeatedly.

July 11th.—Severe gripings; constant efforts to stool, but evacuates only small quantities of very bloody mucus; has passed, however, during the night, a large quantity of dark green feculent matter, mixed with scybala; no pain on pressing the abdomen; a little still on touching the left side of the chest.

Chalk mixture with Tinct. Opii; three grains of Opium for a suppository.

July 12th.—The griping and tenesmus abated after a dose or two of the mixture; returned this morning with some discharge of blood; used the suppository, and has been quite easy since; no pain on pressure; gums swelled and

tender. Pulse 100; urine still very scanty.

Continue chalk mixture. To take ʒss Ol. Ricini in the morning.

July 13th.—Has had an easy night; castor oil has produced three good motions; mouth very sore; pulse 86; tongue beginning to clean; left off taking medicine.

July 19th.—Has been quite free from pain; bowels regular; fast regaining her former health.

Two puerperal women have been severely attacked by the disease. One had two dozen leeches, and the other only one dozen very ineffective ones. Calomel and opium were given, and the bowels were opened once or twice with ol. ricini, combined with ol. terebinth. ʒij. Both recovered*.

MEDICAL BENEVOLENT SOCIETY.

To the Editor of the London Medical Gazette.

SIR,

MUCH pleased with the accounts of Medical Charities, in vol. i. page 638, and vol. ii. pages 247, 341, 377, and your remarks thereon, I anticipated to have soon afterwards seen a statement of the Surrey Benevolent Medical Society, but presume you were not aware of its existence, or some notice ere this would have been taken of it. I beg leave to send you the subjoined remarks, if worthy of insertion.

The uncertainty of life, conjoined with the uncertainty of success, ought to induce every medical man to join some institution of the above description. Those who possess ample means and fear no want, let me remind them of that familiar motto—"Præstat dare quam accipere;" while they who are struggling to get through life, hoping to leave some little provision for the widow and the fatherless, cannot too soon relieve that solicitude by attaching themselves to a society where assistance can be obtained if misfortunes or death demand it. Nor will I hold that practitioner blameless who, because he is single, or has no family, and does not want it, refuses to assist his less fortunate brethren. Such a man is not to be

* From the Med. Chir. Rev. August.

envied.—“Teruncio seu vitiosa nuce non emerim.”

On the peculiar nature of the Surrey Benevolent Medical Society, I may be permitted to remark that relief is afforded to an aged or afflicted member, if requisite—towards the apprenticeship of a child some money is given—and if a member leaves no widow or offspring, but some dependant relative, the benefits of the institution will be extended to such party.

The gratification of its promoters, who, after 16 years, have realised upwards of £2000, will, I hope, be increased by the union of many practitioners in the county of Surrey and parts adjacent. That mutual good feelings among medical men may be widely extended, and their readiness to assist the distressed of their own fraternity be every where evinced, is the earnest desire of

Your much obliged,
RUSTICUS.

July 28, 1829.

ANATOMICAL BILL.

To the Editor of the London Medical Gazette.

SIR,

So crude and ineffective was the Anatomy Bill of last session, that, however anxious for the principle of the bill to be recognized, I could not but rejoice at its merited rejection. As nothing further can be attempted until next session, when some measure of the kind must be brought before parliament, an interval is thus allowed, most valuable if properly employed, for allaying prejudices, which appeals to good sense and reflection cannot fail to dispel, and which are incalculably less than the opponents of dissection are pleased to assume; and for more maturely considering the provisions of whatever bill it may be thought fit to introduce.

In order to abate prejudice, by stating the question as truth and reason require it to be represented, I have sketched an Address, which I purpose diffusing, during the recess of parliament, among the members of both houses. This, however, only goes the length of preparing them for the discussion. The duty devolves somewhere of maturing the measures to be pro-

posed, so as to fit them for effecting the purposes designed; but by whom this will be undertaken I am ignorant. If guided by sound principle, unappalled by idle fears, and assisted by the judgment and intelligence of the higher members of the medical profession, who would both ably and faithfully render their aid, they who prepare the bill cannot go materially wrong.

To be at all suitable, however, or adequate to the necessities which call for it, it must be very different indeed from the rejected bill, which abounds in errors and false views. On this bill I shall now offer a few remarks, not as by any means a complete critique, for which I am unprepared, but merely to show how much judgment and sound discretion are needed for guarding against the errors which this bill so signally displays.

Objection occurs at the very outset, for even the preamble is faulty, evincing a disingenuous attempt to mask the real design of the bill. This design unequivocally is to provide bodies for dissection; one so justifiable in principle, that it ought to be boldly avowed; so important to the community as to merit its constituting the first and chief object of any statute for legalizing the supply.

Instead of a candid declaration to this effect, the bill professes its object to be, “to make further provision for the prevention of unlawful disinterment”; and though in a second clause it includes “the regulation of schools of anatomy,” yet, if we are to judge from the provisions of the bill, this regulation was to consist in watching these schools with jealousy and suspicion, and in restricting rather than facilitating their useful and indispensable labours.

Jealousy of the medical profession, and an extreme tenderness for squeamish feelings and prejudices, the prevalence of which is too hastily assumed, are evinced in every clause of the bill. In both tendencies I believe it to be wrong. I know of no just ground for distrusting either the judgment or good faith of the profession on such a subject; and I am convinced by the experience of a life passed in constant and intimate intercourse with the poor, that both the extent and degree of prejudice, so far as they are concerned, are greatly overrated.

Indeed, if not excited by the irritating and mischievous representations of those

who are carried away by their own inordinate sensibilities, the poor would not fail to exercise their natural good sense, and would, I am persuaded, conform readily to whatever the legislature might think fit to ordain.

The compromising policy of the rejected bill may, perhaps, be right and necessary. It is a point on which, through diffidence, I hesitate to pronounce. But so far as my judgment can guide me, I utterly distrust it, the experience of my whole life having satisfied me, that the far better method of dealing with prejudices is to meet them openly, combat them fairly, and trust to the good sense of mankind for their final annihilation. The mode of subterfuge and evasion may, for a time, prevail against prejudice; which, however, is thus only repressed, not subdued; on the contrary, it is indirectly fostered by the very means employed to overcome it, and, like the fabled Antæus, is sure to rise again from its temporary prostration with renovated vigour.

The licensing of anatomical schools may also be expedient for guarding against their excess; although on this point too my judgment fails to recognize any such necessity, my clear conviction being, that all such matters are best left to their natural and most effectual restraints. Anatomical schools will be little likely to multiply beyond the necessity which calls for them. Imprudent speculation in this respect would speedily correct itself. So far as the demand will support them they ought to exist, and this demand is the only sure measure which ought to limit them; while if the demand fail, it can need no legislative interference to prevent what the speculatists could only pursue to their own ruin. It should not be forgotten that even if this speculation were to border on extreme, the public would be uninjured, for they could only gain by the increased energies which such speculation must call forth.

But supposing the system of licensing to be necessary, and founded in sound policy, I can see no propriety in the kind of board which the bill proposes as commissioners for granting licenses. Why these should not be taken exclusively from the Colleges of Physicians and Surgeons, I cannot perceive a single good reason. The care taken by the bill to ensure a preponderance of unprofessional members in the

proposed board, is at once unjust and absurd—unjust, as casting on the medical profession an unmerited suspicion, and absurd, as being abortive for the very purpose for which it was designed. The functions of this board are such as professional judgment alone could adequately discharge. However constituted, it is medical acumen that must regulate its proceedings: nay, if medical members were wholly excluded, still would the judgment of medical men indirectly and necessarily influence every measure. What then would be gained by the distrust of medical men thus uncourteously evinced? Placed in a minority, they would be proportionally released from responsibility, while the real influence would and must remain with them. This is an occasion on which I deeply lament the want of a great National Institute for presiding over the medical interests of the nation; one which, comprising all the departments of the profession, would stand on high ground, and command public confidence. A body so constituted would be above suspicion, and in its judgment and integrity the senate might safely confide: organized as the profession now is, there may be a difficulty in determining to whom such a trust should be assigned. The mutual jealousies of our medical corporations must here cause embarrassment, for their relative fitness and pretensions would with difficulty be reconciled. On the present occasion, the College of Surgeons would appear the most fit; but then this body would lie under the suspicion of its members having, as anatomical teachers, too great a personal interest in the matter under review to permit their being entirely unbiassed. If such a board of commissioners were at all required, perhaps a deputation from each of the three great medical corporations might form one, free from this distrust, and liable to little exception.

Should visitors prove a necessary part of the system, as provided for by the rejected bill, some care would be required to guard against a vexatious use of this authority. As anatomy schools are open to all who choose to enter them, I can see no adequate reason for any such provision, and my own judgment is directly opposed to it. But if such a precaution were called for by the state of public feeling, which I utterly disbelieve, the office of visitor

should be entrusted to such hands only as would not be likely to abuse it. Against such abuses the best security would perhaps be, the rank and official dignity of the parties appointed. The office should be regarded rather as influential in the prevention of impropriety, and to be called into activity only in extreme cases, than as one for frequent interference, the evil of which would greatly surpass any good that could result from it.

The bill further provides that the commissioners are to make rules for the regulation of the licensed schools. To this extraordinary provision apply all the remarks already made on the proposed constitution of the board. I can conceive nothing more truly absurd than that rules for regulating dissection should issue from a board, the majority of which must be profoundly ignorant of all its principles and details.

The provisions for legalizing the appropriation of unclaimed bodies need a thorough revision, for those of the rejected bill are throughout objectionable and insufficient. Every precaution should be taken for respecting the feelings of relations, whose claim to the body should never be denied. However destitute and friendless the individual, even his own repugnance, if declared, should protect his remains from undergoing dissection.

But when regard for private feeling was carried to this extent, then ought the law for the appropriation of unclaimed bodies be compulsory, and not merely permissive. So long as parochial authorities possessed power in this respect, they would be sure to exercise it in defeat of the objects of the bill. To glean a little popularity by an affected humanity, they would oppose every obstacle to the anatomist's claims: the parties would thus be in perpetual collision; public feeling would be kept in a state of continual excitement, and many of the present evils would be enhanced and perpetuated. When the principles which ought to govern the law in this respect come to be clearly understood, there will be little difficulty, I apprehend, in framing the act, so as to meet all the wants of the anatomist without violating any feelings that merit respect.

The provision for the interment of bodies after dissection is the last which I shall notice. These must have been

framed by persons wholly ignorant of what they attempted to regulate. Fulfilment of the law as laid down in the bill, would be absolutely impracticable, as all who have ever entered a dissecting-room must well know. Funereal rights and solemnities ought not to be withheld; but the time for performing them should be while the body is yet entire. Let a suitable formulary of prayer be provided for this purpose by the dignitaries of the church; let all sectaries observe their own religious ordinances; let every ceremony that can be deemed proper precede dissection; but when the several parts of the body have become separated so as to be incapable of reunion—when the identity of the individual can be no longer ascertained by any care that could be practised, then let the common decency of anatomists be confided in, who will hardly fail to dispose of the remains by such interment as obvious propriety directs, and as they habitually practise. Such an enactment as that contained in the rejected bill would be fraught with vexation, and at best be only a solemn mockery.

I am unwilling to trespass further on your pages. The foregoing remarks are offered, not as a full or perfect critique on the rejected bill, nor as embracing all that can be said, but merely to call attention to a subject which demands the most mature consideration, while this can yet avail. If means be not taken during the recess of parliament to prepare a bill worthy of being passed into a law, some crude enactment will take place, the errors of which it may be afterwards too late to deplore or amend.

As a call on individual activity, this or any other appeal can have little effect. Where all are equally concerned, who can come forward as the champion of public interests without impeachment of presumption and arrogance, such as no liberal mind likes to incur? I call then on our great medical corporations to arouse from their lethargy—to assert the consequence which on such an occasion they are entitled to maintain—to protect the interests of that science which it is their bounden duty to uphold—to fulfil a trust especially confided to them. Let the Colleges of Physicians and of Surgeons, with the Apothecaries' Company, coalesce for a purpose in which they have a common interest;

let them prepare the draft of a bill, such as the occasion requires and the legislature would be justified in adopting; let this be transmitted with the full weight of their authority to the Secretary of State for the Home Department, and let not a measure of this magnitude be longer abandoned to casual advocacy and unenlightened zeal. In doing so, they will at least acquit themselves of their duty, and whatever attention they may receive, some good cannot fail to result even from the deliberations in which they must engage. By longer neglect, they will subject themselves to the reprehension deservedly attaching to such supineness, and will not find it easy to repel the charge of being unprofitable servants of the public.

With my best acknowledgments for the uniform support which your columns yield to the cause of sound sense and correct feeling, and for the zeal and ability which you display in maintaining the true dignity of an honourable profession,

I remain, Sir,
&c. &c. &c.

[We are desirous of directing attention to the preceding letter, which is from the pen of a very intelligent physician, well acquainted with the necessities of the profession, and the importance of the subject on which he writes. We would respectfully, but most earnestly, submit to our medical and surgical corporate bodies, the observations of our correspondent with regard to the part which he recommends them to take on this question. *They* ought to be the medium by which the government are made acquainted with the wants of the profession; and a representation supported by their united influence could not but have great weight with parliament, while it would go far to satisfy the public mind. If nothing be done till the Bill is again before the House, it will be too late to obviate any of those objectionable clauses which may be thrust into it by those who stultified it last session, after a tolerably good bill had been actually drawn up.

We have received the address to the members of parliament alluded to in the letter, and shall give it next week; meantime we earnestly call upon our brethren to lose no opportunity of enlightening all those with whom they are acquainted upon this subject—but to

take especial pains to make the PEERS understand it—for with them lies at once the greatest difficulty and the greatest obstacle.]

PULVERIZATION OF CALCULI.

To the Editor of the London Medical Gazette.

SIR,

IN a note inserted in the London Medical Gazette of last Saturday, relating to an exhibition of lithotritic instruments, at the house of Mr. White, the errors it contains are sufficient ground to justify the sole pupil and participator of M. Civiale, in his long series of brilliant operations, in coming forward to vindicate the character of his instruments, already established *on more than one hundred and twenty* successful cases. The assertions made in the note alluded to, if published in Paris, would not require any reply; for there the subject has been discussed and decided upon; but in England this method of operating is only in its infancy, and consequently it is of the most vital importance that the profession and the public should not be led into false notions respecting the *modus agendi* of Civiale's instruments; and though I may be persuaded that the mis-statements in this paper have been made uninvincibly, I feel, nevertheless, bound to correct them *as* mis-statements.

The first instrument exhibited was the three-branch pincers, with a simple perforator, which the author of the note supposes to be employed in commencing the perforation of the calculus. He admits the value of this instrument when used for a stone not exceeding much in size that of the drill; and taking it for granted that this instrument is employed for perforation only, he arrives at this conclusion: "that it is only by repeated drillings the destruction of a calculus, even of middling size, can be accomplished."

I feel great satisfaction in being able to confront the foregoing assertions, with the explanation which M. Civiale himself formerly addressed to the Academy of Sciences on this subject. After premising that the objection taken is founded on erroneous ideas, he goes on to state, "In the case of a small calculus, perforation is altogether unnecessary. The

stone is crushed with facility and promptitude, by the combined pressure of the head of the perforator and the branches of the pincers. When the stone is of middling or large size, the excentric perforator is employed: with this perforator, each hole made in the stone is six lines in diameter, and passes through the portion of the stone which is within the grasp of the prongs, that is, the two-thirds or three-fourths of the whole mass. In the space of a few minutes, when the stone is of middling hardness, a hole is pierced through it to the depth of an inch. It is not difficult to imagine with what facility a stone may be crushed which has undergone only four such perforations, which form the same number of breaches on its surface, and within which an excavation has been effected of twenty lines in diameter. The facility with which the stone is now crushed is still further increased by the fragments which have been detached from it during the previous part of the operation, either by the pressure of the perforator or the rapidity of its motion."

This explanation of M. Civiale enables us at once to appreciate the circumstance of a stone (not a human calculus) being handed about, in which fifteen perforations had been made, without its breaking. Now, I would ask, what degree of pressure of a three-branch pincers would this composition, so industriously drilled, have borne, without breaking, when but even a fifth of the above number of perforations had been made in it?—or whether it can, in its present state, sustain, without crumbling to pieces, even the slight pressure of a four-branch pincers?

The second instrument shewn is the three-branch pincers, with the perforator *à virgule*, so named from its inclining at the extremity so as to resemble a *virgula*; applicable, as it is affirmed, to stones from eight to twelve lines in diameter. There is here, I fear, considerable misapprehension on the part of the writer of the note. This perforator was brought out in Paris with the assurance that it was peculiarly destined to large stones; it is described, in the words of the report, as *capable of scooping out, in a few moments (quelques instans) a stone of considerable volume*.

Let us see what M. Civiale says on this point. "The only thing wanting

to this process, is its being possible. I can easily prove that it cannot be applied to more than one-eighth of the calculous patients susceptible of cure by lithotrity, and that even in this small number, the operation cannot be terminated in a single sitting, however favourable the condition of the patient may be. Nay more, that the operation is dangerous.

"In order that a stone may be scooped out in this manner, it must be spherical; the weakness of the virgule requires that it should be soft (*friable*). Now in eight calculous patients we are not certain of finding one who presents these conditions. It is also necessary that the stone be fixed in the pincers, so that the perforator shall attack it in the centre precisely, a circumstance which is not likely to take place. If this method were applied to calculi of a different form, the scoop or virgula would be broken against the brim of the hole, which would inevitably be made on the flattened surface of the stone or against a branch of the pincers which might correspond with this hole. If the operator sought to avoid this danger, the shell would remain so thick in certain parts that it would be impossible to break it."

"It is really astonishing to find it asserted that the stone may be scooped out in a few moments. This process is, on the contrary, the slowest of any hitherto proposed. The first perforation is only about two lines in diameter. It is not enlarged by inclining the virgula or scoop throughout the entire thickness of the stone, but merely at the point which corresponds to the extremity of the virgula. Now, in order to enlarge the hole throughout its entire extent, the perforator should be made to work from before backwards. The pressure of the virgula, during this stage of the operation, must be moderate indeed, as the strength and solidity of the unsupported virgula decreases in proportion to the degree of its inclination. Under these circumstances we may form some idea of the little resistance which an instrument, so complicated and so slender, (being only two lines in diameter), can offer.

"The cause of error, respecting the action of this instrument, arises from the result obtained by experimenting on composition stones, which have been modelled to the form and consistency

intended. It is on such compositions that the action of the new instruments still continues to be shewn. In those trials the operator knows the size of the stone: he sees how it is placed in the instrument, and in what manner he is to proceed. What confirms the opinion, that the new theory is founded on trials of this nature, is, that each instrument, and even each part of this complicated apparatus, has a special destination; but when the stone is attacked in the patient's bladder, the operator has none of these data; and if he would save the patient's time, and spare him unnecessary suffering, the instrument employed should be capable of adapting itself to the different circumstances that may arise."

The third instrument is the forceps pincers, adapted to stones measuring from twelve to eighteen lines in diameter. The writer here makes a very extraordinary assertion; viz. that the three-branch instrument cannot seize a stone of this diameter. This is a mistake, as far as it regards the three branch instrument, and an admission on the part of M. Heurteloup, that he has no instrument capable of seizing, and fixing firmly, a calculus measuring from twenty to twenty-five lines in diameter. M. Civiale's three-branch instrument seizes with facility calculi of this size, being the largest to which his instrument, or any other yet made public, is applicable.

The fourth instrument is the *brise-coque*, or shell-breaker. M. Civiale has proved satisfactorily the impossibility of terminating a single operation by means of these instruments. They were not suited to the seizing or crushing of small calculi, or the fragments of large ones; and, consequently, it was necessary to imagine an instrument *ad hoc*. This is the *brise-coque*: it consists of two blades, united by their flat surfaces, and forming a cylinder. At the vesical extremity the blades are *shark-beaked*, and furnished with file, serræ, or teeth; and when freed from the pressure of the open canula, into which they are received, they open by their own elasticity in the same manner, but not to the same extent as the three-branch pincers. The action is a combination of sliding and pressure; sliding when the external wheel moves one blade upon the other, and pressure

when both blades are drawn at once towards the open end of the canula.

With respect to this instrument, which is said to be M. Heurteloup's master-piece, it is only necessary to observe, that it is merely the *brise-pierre* of M. Civiale reproduced, and which the latter submitted to the inspection of the Academy of Sciences, in its sitting of the 29th August, 1825, and which he sometimes made use of in his first operations. The description of this instrument may be seen in his work on lithotritry. While on this subject it may not be uninteresting to enumerate the instruments of this particular description that have been offered to the public, each differing in some unimportant detail from the other.

1. M. Gruithuisen's. 2. M. Civiale's. 3. M. Amussat's. 4. M. ——. 5. M. Rigaud's: (this instrument has three branches.) 6. M. Rigal's. 7. M. Colombat's. M. Heurteloup's makes the eighth. There are divers others from different cutlers.

This instrument, in M. Civiale's hands, has fallen into disuse. In all cases where it might be employed, the three-branch instrument is applicable, and is justly preferred to it. M. Civiale laid this instrument aside from the difficulty he felt in seizing the fragments, and on account of the risk he ran of pinching the bladder. I have been assured there is some coyness in shewing this instrument; I cannot comprehend for what reason. The value of the instrument is simply that of an object of *vertu* in the arsenal of the lithotritist: as a practical means for crushing stone it is wholly superfluous.

The principles of destruction, which lithotritry possesses, are perforation, excavation, and crushing. The two latter, according to the writer of the note, are due to M. H. This statement is totally incorrect, and M. H. has not, I am confident, set up so extraordinary a pretension. In M. Civiale's method, perforation or excavation is effected by means of excentric or shoulder perforators, (the open or divided perforators he now no longer employs, on account of their want of solidity): the excavation thus effected is for each drilling from 7 to 9 lines in diameter; and the crushing is effected by the pressure of the head of the perforator, and the branches of the pincers, which adapts itself with equal

facility to a fragment no larger than the drill itself, or to a calculus of two inches in diameter.

I beg leave to insert the letter of Baron Dubois, addressed to the profession on the occasion of his cure, performed in May last, by Dr. Civiale. It is altogether unnecessary to remind your readers that the personage alluded to is Professor of the School of Medicine, and the Nestor of French surgery: the preference of such a man for Civiale's method requires no comment:—

“ Paris, le 4 Mai, 1829.

“ Monsieur le Redacteur,—Permettez-moi, par la voie de votre journal, d'adresser mes remerciemens à mes confrères pour l'intérêt qu'ils m'ont témoigné à l'occasion de ma maladie, et l'opération qu'elle a exigée. Graces aux soins de mon ami M. le Dr. Civiale, je suis délivré de la pierre, et ma santé s'améliore de jour en jour. Je suis heureux de pouvoir ajouter quelque chose aux suffrages qui ont accueilli la merveilleuse découverte de la lithotritie, qui remplace si avantageusement l'une des opérations les plus terribles et les plus dangereuses de la chirurgie, et à laquelle M. Civiale a irrévocablement attaché son nom.

“ Agreez, &c.

“ A. DUBOIS.”

I may have trespassed too largely on your columns, Mr. Editor, but I trust you will have some indulgence for the peculiar situation in which I am placed; and I have the honour to be, &c.

W. B. COSTELLO.

29th July, 1829.

P.S.—Since writing the above, I observe it has been stated* that the title of Baron has been conferred on M. Heurteloup, for his merit as an operator for the stone. This is incorrect—Baron H.'s title descends from his father, who was created Baron by Bonaparte. The only title conferred by the Sovereign for merit as a lithotritist, was that of Knight of the Legion of Honour, bestowed on Dr. Civiale.

[We believe that the article in our number of July 25 was a correct account of the demonstration given by M. Heurteloup. At the bed-side of the patient alone can the comparative merits of the different operators and instruments be decided; and we understand that M. Costello is now operating upon

several patients in London. The result shall be laid before our readers as soon as the cases are complete*.]

ANALYSES & NOTICES OF BOOKS.

“ L'Auteur se tue à alonger ce que le lecteur se tue à abrégér.”—D'ALEMBERT.

An Essay upon the Treatment of the Deep and Excavated Ulcer. With Cases. By RICHARD ANTHONY STAFFORD, Member of the Royal College of Surgeons, and lately House-Surgeon to St. Bartholomew's Hospital. 1829.

MR. STAFFORD appears to be an ingenious man, but we think that, on the present occasion, he has acted very injudiciously, in extending a solitary fact, or proposal, into a book. After all, he has only been able to spin it out to seventy-two pages, *fifty-one* of which are occupied with cases; and those, too, with so many blanks that the whole might easily have come into one-half the space. The entire work, indeed, would scarcely occupy above fifteen or twenty pages of this Journal, and it affords an excellent illustration of the motto placed at the head of this department—“ L'Auteur se tue à alonger,” &c. &c.

The author proposes to treat deep ulcers, of almost every description, by pouring wax into them when it is cooling and just about to become solid.

“ In this manner the under surface of the wax, when cold, comes into close contact with the general surface of the ulcer, and the whole excavation is filled by it. Before employing it, however, it is necessary that one or two precautions should be taken: first, in order to clean the sore, as much of the pus as possible which rests upon it should be absorbed by dry lint; and secondly, in order to avoid burning the patient, the wax should be at that point of heat which is called by chandlers *setting*; that is, a portion of it should cling to the sides of the vessel in which it was melted, and the rest should begin to thicken, and have somewhat of an opaque appearance. In this state it will not be at much more than blood heat, and it can be used with perfect

* In the Lancet.—ED. G.

* See Mr. White's letter, p. 319.

safety. It is advisable, however, even when so far cooled, that a brush be dipped in it, and that the wax be allowed to drop from that into the sore. After the wax becomes perfectly solid in the ulcer, a strip or two of adhesive plaister may be applied over it, to keep it in its situation; when it may be left until it requires to be dressed again, which will be on the third day after its application."

And again :

"The superiority of this plan of treatment is, that the sore is healed much more quickly, being, in fact, so rapid, that it is accomplished in one-third of the time usually occupied, and with much greater certainty than where the common methods are employed. It succeeds also where no other remedy will, as may be seen by the cases. It excludes the air from the wound, shielding it at the same time from external objects; it makes equal pressure upon its surface, and thus supports its tender vessels; and it imitates the process which nature herself pursues, the healing of a sore by scabbing. All these are of great use; for, in the first place, by the exclusion of the air, much irritation and pain is avoided; in the second, by the support it gives to the tender vessels of the ulcer, the cicatrix is of a more firm and solid texture; and in the third, by the scabbing process, it is healed in a more regular manner. In addition to these advantages, the pain, when the wax is upon the sore, is so little, that many of the patients have informed me that they have been almost unconscious, not only of its presence, but even of the existence of the sore itself.

"The cases where the plan of treatment I have recommended might be advantageous, are, the open and excavated bubo; ulcers of the legs; indolent serofulous sores; excavations in the flesh, in consequence of sloughing phagedena; ulcers situated over large arteries; sinuses, and fistulous passages, that have been laid open; the sores left by extensive burns, broken chilblains, and, in short, those of any depth, from whatever cause they may arise. In most of the cases I have just enumerated, the wax has been employed; but more particularly in ulcerated legs, open buboes, and serofulous sores. In these, of whatever character or description they may have been, the

treatment has succeeded, and the healing process has been forwarded with greater rapidity than where the ordinary applications have been used. Its utility does not appear to be confined to any one particular state of the ulcer. When it is extremely foul, and even covered by a sloughy matter, as in Butler's case, on the removal of the wax it has presented a clean surface. Where the ulceration has been extending, its progress has been immediately arrested, and it has shewn a disposition to heal. When the sore has been connected with varicose veins on the leg, it has been attended with equal advantage; and when its character has been of so languid and indolent a nature, that no remedy could excite a healthy action, the stimulus and support of the foreign body, that is, the wax, has, as it were, like a charm, produced strong and florid granulations."

The numerous cases above alluded to are detailed in illustration and confirmation of these statements, and appear to bear out the author in his favourable opinion of the remedy.

ANALYSES OF BRITISH MEDICAL JOURNALS.

LONDON MEDICAL AND PHYSICAL JOURNAL.

July 1829.

On the Pathology, exciting Causes, and Treatment of Bubo. By S. D. BROUGHTON, Surgeon to the 2d Life Guards, and to the St. George's and St. James's Dispensary.

MR. BROUGHTON observes that there is no species of tumor so frequently presented to the surgeon's notice, and at the same time so troublesome to manage, as the common bubo, or enlarged glands in the groin and axilla. Its course is usually marked by an uncertain character, and is productive of more or less constitutional irritation. Interposed between the trunk and the limbs, every movement of the latter irritates and inflames the tumor and the surrounding integuments. Emaciation and debility generally ensue from this state of parts, and not unfrequently fever attends. The absorption of morbid matter, and its conveyance into the body of the gland, appear to be points resting entirely upon hypothetical bases.

In the greater number of cases commonly met with, the bubo probably arises from some local irritation, mechanical or otherwise, and remote from the apparent affection. Thus, an irritable corn, or pressure from a tight boot, a scratch or excoriation of the skin, or any other such simple cause, acting upon parts in the absorbent line of direction leading to glands, is just as likely to excite a bubo as the introduction of virulent matter; nor are the signs which buboes exhibit from either source in any way peculiarly characteristic of the original exciting cause, although their subsequent appearance may perhaps become modified by constitutional diathesis. In whatever manner the bubo may be produced, its occasional progress indicates the necessity of an early attention to the means best calculated to disperse it, in order to obviate suppuration, as well as to prevent that indolent state often assumed, and which is a source of much annoyance to the patient.

If the formation of buboes be carefully watched, we shall find that the glands themselves are the first seat of inflammatory action, and this condition is not generally traceable along the course of the lymphatic vessels connected with the affected glands: frequently, indeed, the exciting cause is looked for in vain. Usually the mere enlargement of a single gland is not productive of much pain until the surrounding cellular connexions become involved, and the throbbing of the neighbouring cutaneous vessels renders the integuments tense. Although sometimes the cellular inflammation extends far around, and an erysipelatous action occasionally supervenes, yet the inflammatory condition of the parts is most commonly circumscribed.

The proximate cause of this affection appears to be obstruction to the free course of the lymph. Whether the fluid may hold suspended in it any virulent substance or not, seems to be a very doubtful question. The probability appears to the author to be, that the *proximate cause is irritation only, and not absorption of virus; and that the latter, when existing, is only the remote cause.*

When suppuration occurs, it is in the centre of the tumor, and the surrounding walls of condensed cellular texture perfectly enclose the pus, and thus the

abscess is contained in a sac. This process is gone through with different degrees of celerity: when slowly conducted, the pus may often become dispersed. But, when the formation of pus is rapid and copious, the irritation from overstrained skin is excessive, and relieved only by a spontaneous discharge of its contents, or by an artificial opening.

Excepting the pain and irritation from pressure, the presence of the pus, or even its reabsorption, appears to be innocuous; unless, indeed, the stagnant collection, by exposure to the atmospheric air in an open bubo, should generate carburetted and sulphuretted hydrogen gas, when the altered qualities of the pus become the exciting cause of serious disorder.

Mr. Broughton is unaware of any specifically marked signs by which the terminations are to be prognosticated, until the eve of their occurrence. The agency by which the changes are affected lie concealed, and the vicissitudes which buboes go through have, in consequence, a capricious appearance. The changes seem to be rather referrible to the integuments and cellular substance over the inflamed gland, than to the gland itself, and these run into inflammation more or less extensively, probably dependant upon constitutional peculiarities rather than any which may be connected with the ultimate exciting cause.

From whatever source a bubo may originally proceed, there seems to be no proof that its progress is influenced by it. A mild gonorrhœa, a phymosis, an injury of the foot or toe, &c. are followed by buboes, similar in their appearance and termination to those arising from the most virulent gonorrhœa, or the inoculation of poisonous matter. When, therefore, we hear of the malignant, the mild, the sympathetic, the syphilitic, or the strumous bubo, Mr. B. should be disposed to refer all these characteristic distinctions equally to constitutional influence, to the disorders of health, and not to the nature and properties of the ultimate exciting cause.

The first indication of treatment seems to be to remove the irritation derived from the presence of an enlarged and indurated gland; the means most suited to which end appear to be such as sooth the swollen parts, and these are of a topical kind. Local applica-

tions, in conjunction with repose in a recumbent position, will thus tranquilize the system. The choice of local remedies must be guided by the state of the parts. The active and irritable state requires one species of application, and the indolent and insensible another.

If the incipient bubo be irritable, the remedies should be directed to the tranquillizing of the parts. The inflammation of cellular surfaces seems to be beneficially treated with cooling, astringent, and evaporating lotions; but, in glandular inflammation, such remedies appear to be insufficient, if not injurious. They are not calculated to relax and soothe the indurated and irritable gland, to check its suppuration, although they lessen the inflammatory action of the softer and more yielding parts around. The application, also, of leeches in the incipient state appears to aggravate the condition of the tumor, so that the advantages of abstracting blood seem to be counterpoised by the irritation of the leech-bites. Experience has led Mr. Broughton to discard the use of cold lotions and leeches, as inadequate to secure the fulfilment of the objects in view. A moderate and equable degree of warmth, combined with moisture, is more calculated to soothe the parts, and finally disperse the tumor. Fomentations thrice a day, succeeded by light, warm, and moist poultices, may be advantageously applied; and, if these be insufficient to allay pain, the fomentations and poultices may be made of the decoction of poppyheads and conium. Where the tumor is not active and irritable, its advance may sometimes be checked by cold washes; but it is then liable to become stationary and indurated; an effect not resulting from the use of fomentations and poultices.

With regard to constitutional remedies, such as tend to diminish the action of the heart and arteries, and assist the dispersion of the tumor, are indicated. Tartarised antimony, with saline mixture and Epsom salts and senna, the author has always found to be highly useful, and far preferable to narcotics, excepting as local applications. Where plethora is present, bleeding from the arm will tend to check the inflammatory stage, with general advantage to the system; but, when fever does not exist, and the tumor is not actively inflamed, the reducing plan may

perhaps be injurious rather than beneficial.

It occasionally happens that the incipient stages of bubo are not attended with tension of the integuments, which lie loosely over the surface of the tumor; but this state may soon become altered, if repose be not enjoined, and the case thus become prolonged. This passive state is also more aggravated by cold applications and leeches; but it is less likely to be completely reduced by mild, moist, and warm applications, than the more irritable and active tumor. When these, therefore, have apparently brought the parts into a state of passiveness, and the induration yields no further, blisters repeatedly applied, or cautious and gentle friction with the *Linimentum olei camphorati* often tends to the removal of this chronic state. Should too much action be excited, the fomentations and poulticing may be resorted to again. If the first intention of stimulating remedies be not fulfilled, they have this advantage that they bring the tumor forward to suppuration.

When the measures which Mr. Broughton has recommended in the primary state of bubo do not succeed in preventing its advance to the secondary state, the same treatment which is calculated to disperse the tumor will facilitate and concentrate the process of suppuration. Perhaps, when such is the termination indicated, it is best not to interpose with an artificial opening. The accumulation of stagnant matter should be avoided, and an emollient poultice applied thrice a day, with gentle and gradually increased pressure, is well calculated to promote the discharge of the pus, and encourage the adhesion of the parietes of the sac. When this cannot be brought about, but a weeping orifice continues, the sac may be irritated by stimulants, or destroyed by escharotics.

In this stage of the affection, a generous diet, regular mode of life, and good air, are as essential to the patient as are low diet and reducing measures in the primary state. But, if the suppuration has not been accompanied by high inflammatory action, spontaneous discharge is either procrastinated or altogether avoided. In some cases the quantity of pus becomes gradually diminished while poultices are being applied, but rarely entirely removed; and

where a languid state of the parts around exists, Mr. B. has known the dispersion of the pus accelerated by blistering. The same result may also be sometimes produced by the cautious pressure of a flannel bandage, passed across the tumor, and round the loins and thigh. Sometimes, also, poultices mingled with mercurial ointment and soft soap are found of service. But if there seems to be no indications of such measures effecting the removal of the pus, it appears preferable to make an opening, either by a simple puncture, a long incision, or the application of caustic so as to form a deep and wide eschar. Of these methods experience has taught the author, in general, to reject the first. The two latter operations appear to be greatly preferable; and of these, perhaps, the formation of an eschar by caustic is the most effectual of the two. The manner in which the author prefers applying the caustic is to rub the skin covering the bubo with the Kali purum dipped in a drop of water, till the parts to the extent of about a shilling are sufficiently affected to ensure the destruction of their vitality. An emollient poultice, mingled with narcotic substances, should then be applied. The parts generally granulate and cicatrize speedily with the application of astringent, or stimulating solutions, simple or digestive ointments, in conjunction with pressure, or of mild poultices, should inflammation occur. When the parts treated with caustic recover from the first state of irritation, moderate exercise promotes rather than impedes the healing.

It very frequently happens that the healing of open buboes is retarded by the presence of an enlarged gland. No remedies, constitutional or local, will then succeed in inducing entire and permanent cicatrization. The only remedy in this case which I have found to be effective is the destruction of the gland. The loss never entails the least inconvenience, and the safest and most complete method of destroying it is by the introduction of small pyramidal troches into its substance, composed of minium, amalgamated into solid masses about an inch long with solution of gum arabic. Their number should be gradually increased, and in a short time the gland will be thus removed.

“From the result of some years’ observation and experience, (says the

author), I am led to conclude that the treatment of buboes needs not to be influenced by a consideration of the remote cause, until the sores established in their open state become affected by some constitutional diathesis, or morbid condition of irritability or otherwise, when the ordinary measures recommended for the alteration of the diathesis, or restoration of the system to health, will afford the most rational source from which the healing of the sore may be finally expected.

“The mild or malignant character of a bubo I consider to be dependent on constitutional peculiarities and accidental circumstances; and, while its various phenomena require different methods and modifications of treatment, no advantage can be expected to result from any consideration of the remote exciting cause, any further than its removal as a continued source of irritation while it remains. I would encourage the mild bubo with gentle means, irritate or stimulate the indolent bubo, and soothe and tranquillize the bubo of the malignant kind; and in all cases regard the constitutional diathesis as a frequent immediate cause of any difficulty which may exist in the final destruction or healing of the bubo, excepting where any such obvious obstruction as that of a diseased gland presented itself to my notice.”

Observations on the Treatment of Hooping-Cough, and on the Use of Sulphate of Quinine in that disease. By a SURGEON.

There were sixteen children on board a ship returning from India, who became affected with hooping-cough. There is nothing to remark in the history of the symptoms; but the account of the treatment is not destitute of interest.

“When unequivocal symptoms of the disease appeared, doses of ipecacuanha, according to the age of the patient, were given night and morning, so as to produce full vomiting. In the intervening time, a mixture of antimonial wine, laudanum, and sulphate of quinine, made into a draught with syrup and water, was given thrice a day, at intervals of five hours. The dose for a child of two years was three drops of the antimonial wine, one of laudanum, and half a grain of quinine. When the

first, or contagious stage, was over, the quantity of the two former was diminished, while the latter was increased. Burgundy pitch plaisters were applied to the breast, and between the scapulæ. The bowels were kept moderately open by calomel and rhubarb; the diet was light and nutritive. This treatment was generally successful in about a month.

“ There was an interesting boy of three years who suffered extremely. The convulsive paroxysms were violent, and the quantity and tenacity of the mucus such as threatened suffocation. He was reduced to such a degree, that (to use his nurse’s phrase) he was a mere ‘ bag of bones:’ yet, by a steady perseverance in the above treatment, his recovery, though late, was yet complete. Several expedients to divert his attention, by play, toys, &c., were of use as auxiliaries. The quinine in the second stage was decidedly beneficial; and it is in this stage, where the disease is supposed to remain in the system merely from the power of habit, that the exhibition of tonics, and above all the quinine, is indicated.

“ I was induced to make trial of this medicine from the great approbation with which Dr. CULLEN mentions the virtues of Peruvian bark in this disease. ‘ I consider the use of this medicine,’ says he, ‘ as the most certain means of curing the disease in its second stage; and, when there has been little fever present, and a sufficient quantity of the bark given, it has seldom failed of soon putting an end to the disease*.’ In the cases that came under my observation, there was little or no fever; and I should think, from the small bulk and the soluble nature of the quinine, that a sufficient quantity can be given, without the inconveniences attending the exhibition of the bark.

“ I have said that the quinine, in the second stage, was decidedly beneficial: it certainly appeared to me so; yet, perhaps, I ought to qualify the expression. In estimating the effect produced on diseases by remedies, it is difficult to determine with precision the exact share which these have, apart from adventitious circumstances, in bringing about a favourable termination. In the present instance, the state of the atmosphere appeared to exercise

considerable influence over the disease. During moist, hazy weather, the expectoration was more copious and viscid, and difficult of separation. When the air was hot and dry, it was scanty, the cough more distressing, and in one or two instances streaked with blood. Between the tropics, and during the prevalence of the trade-winds, when the weather was fine and clear, it was particularly mild. How much we are to attribute to the state of the atmosphere, I know not: one thing, however, will, I think, be granted—that the constant succession of climate that is experienced during an Indian voyage will rather have a salutary than an injurious effect upon the disease.

“ Should the use of the quinine in hooping-cough prove efficacious in the hands of other practitioners, I shall feel gratified. It deserves, at least, a fair trial; and it is exempt alike from danger and inconvenience.”

The present number of the Journal also contains an “ *Account of the Typhus Fever and fatal Epidemic Variola and Varioloid Disease, that prevailed at Halifax, Nova Scotia, in the summer of 1827, and winter of 1827-8, by W. DONNELLY, M.D.*” The diseases presented all their usual phenomena.

August, 1829.

Remarks on the Poisonous Properties of the Laburnum. By A. T. THOMSON, M.D. Professor of Materia Medica at the London University.

The laburnum is a poisonous plant, and the active principle on which this quality depends resides both in the flowers and the seeds. The vulgar have always regarded the seeds of the laburnum as poisonous. MM. Chevallier and Lassaigne analysed the seeds, and procured an extract, which they named *Cytisine*, and which, on being taken into the stomach, operates as a violent emetic and purgative. A dose of five grains acts as severely as a dose of three grains of tartar emetic. M. Chevallier took eight grains, which operated in the most alarming manner; but the effects were combated successfully by means of acidulated drinks, freely administered.

The following is the method of making it employed by MM. Chevallier and Lassaigne:—

“ Bruise the seeds of laburnum,

* Cullen’s Works, by Thomson, vol. ii. p. 463.

digest them repeatedly in alcohol, and, having evaporated the tincture to the consistence of an extract, dissolve in water, filter the solution, and treat this with acetate of lead, to rid it of the acids and colouring matter. Filter the solution. The cytisine, mixed with acetate of lead in excess, passes through the filter; separate the salt of lead by means of sulphurated hydrogen gas, and filter. The cytisine is procured in the form of an extract by evaporating the filtered solution."

Review of some of the Surgical Cases which have lately occurred in the Royal Infirmary of Edinburgh. A Clinical Lecture delivered to the Students of Surgery in that Institution, on Thursday, 26th Feb. 1829, by GEORGE BALLINGALL, M.D. F.R.S.E.

The most interesting parts of Dr. Ballingall's lecture have been inserted in former numbers of the Gazette, and therefore, although both the cases and remarks upon them are good, of course we cannot recapitulate them.

Half-yearly Report of Cases in Midwifery, which have occurred in the northern district of the London and Southwark Midwifery Institution. By C. WALLER, Esq.

This is little more than a numerical return. There are no facts or remarks worth extracting.

Cases of Scirrhus Ovaria. By Mr. J. LEONARD, Surgeon.

Two common cases of disease of the ovarium.

Experiments showing the Effects of Morphine and its Acetate upon persons in health. By Dr. BERAUDI, of Turin.

This paper, which is translated from the *Annali Universale di Medicina*, contains an account of the effects of acetate of morphia upon three young gentlemen, who took it in doses of from one-eighth of a grain to a grain. It produced pain in the epigastric region, frequency of pulse, headache, dilatation of the pupil, followed by sleep and perspiration; these effects varied according to the dose.

Experiments and Observations on Mesmerism. By RICHARD CHENEVIX, Esq. F.R. and E.S., M.R.I.A., &c. (3d article.)

A repetition of the same unsatisfactory statements which have characterised the former papers of Mr. Chenevix on this subject.

HOSPITAL REPORTS.

GLASGOW ROYAL INFIRMARY.

Tumors removed from different parts of the body.

CASE I.—Mrs. Kyle, æt. 61, was admitted January 26, by Dr. John Couper. Sixteen years ago she observed on the outer and upper part of the left thigh a firm moveable tumor, about the size of a filbert; was aware of no cause. It gave no pain, and increased very slowly; for twelve years afterwards it was no larger than an orange. About this time it became affected with occasional pain, which she describes as of a stinging character; its increase was now more rapid, and on her admission into the infirmary the following were its appearances:—The tumor was pendulous, of an oblong shape, or rather somewhat pyriform; in length it measured 12 inches, and in circumference, at its thickest part, about 18; it was lobulated, and had a firm, though not a hard feeling, and moved easily on the thigh, appearing not to be very firmly attached. An ulcerated spot on the top of the tumor discharged thin and very foetid sanies. This ulceration had taken place about a year before. The skin, for two or three inches around this, was of a pale red; in other parts it was natural in colour. Complaints of severe stinging pain, which, however, is only occasional. The veins of that limb are varicose. Three weeks ago bleeding to the extent of 1lbij. took place from the ulcer. Much fallen off in strength, and appetite bad; pulse 100, of moderate strength.

On removing the tumor on the 28th, it was found to be entirely adipose; nearly a third, at its anterior part, had passed into a state of ulceration. It weighed 1lbv. 3ix. After the excision, the edges of the wound were brought together by stitches and adhesive plaister. It healed slowly, but without any bad symptom.

CASE II.—Isab. Cherry, æt. 60. A year ago a hard tumor, not larger than a pigeon's egg, and for which no cause could be assigned, was observed on the left mamma. It was without pain, and at the end of three months had not greatly increased. At this period she happened to fall and receive a blow on the tumor; after this a thin discharge, which continued for three weeks,

took place from the nipple; the tumor became affected with sharp pain, and increased more and more rapidly. When she presented herself at the infirmary, on the 3d of April, over the left side of her chest was seated a tumor of enormous dimensions—it measured round its base two feet one inch, and, increasing as it proceeded outwards, its greatest circumference was two feet four inches; across its summit, in one direction, one foot five inches, in another one foot two inches. The inferior three-fourths of the tumor had a fluctuating feeling; the upper fourth was firm. Its surface was irregular—in some points prominent and more distinctly fluctuating. In the axilla was a gland the size of a walnut, and below this an induration, as if prolonged from the tumor, was felt, extending up the latissimus dorsi. It appeared to move pretty freely over the subjacent parts. Complained of sharp pains shooting occasionally through the tumor—most severe at its lower part. Her appetite was much fallen off; her countenance anxious and sunk; she had cough, with slight expectoration, not purulent, and after exertion, dyspnoea; pulse 76. The only remedies she had used had been frictions, with turpentine and camphora ed spirits.

A consultation determined that the tumor should be removed, but we were given to understand that no very sanguine hopes of success were entertained. Mr. Cowan began by making a puncture with an abscess lancet in the most depending part of the tumor; more than ℥iv. of fluid, of a dark bloody colour, were evacuated. He then dissected out the tumor in the usual way. Besides the large cyst, the contents of which had been evacuated, four others of a smaller size were found; they were all firmly connected together, and to the subjacent parts, by a fibrinous substance, chiefly semi-transparent, and nearly colourless. In the lesser cysts the fluid was without colour; in the large one, as has been already said, it was bloody, and attached to the walls of this cyst there was also a quantity of thick, soft, pasty matter, of a light brown colour, and separable only by maceration. Every diseased part was carefully dissected out. Although no unusual quantity of blood was lost, the incision was necessarily of an immense extent, and the patient seemed exceedingly exhausted; indeed it was the general impression that she would not survive the night. Two ounces of brandy and 50 drops of laudanum were given immediately after the operation: part of this was vomited. At bed-time had gr. ij. of opium, and passed a tolerable night.

Next day, at the visit, her pulse was 100, the skin moist, and the bowels open. She had considerable thirst.

Sum. statim Pulv. Doveri gr. x. et h. s.
Opii gr. ij.

On April 12th (the third day after the operation) the wound was dressed for the first time, and was found to be nearly adherent throughout.

On the 16th some pain and redness at edges of wound—removed by leeches.

May 9th.—Has improved daily; wound cicatrized; appetite excellent; cough trifling. Dismissed cured.

CASE III.—Jas. Liddel, æt. 27, farm servant, admitted April 14th. In the left axilla, extending downwards towards the hypochondrium, is a tumor of a pyramidal shape, and larger than a child's head; its base passes deeply into the axilla, but it is moved easily; it is irregularly nodulated and firm on pressure, except at the apex, where it is felt to fluctuate, and here the skin is of a reddish colour; in other parts it is natural. Over the surface of the tumor run several large veins. Has darting pains occasionally in the tumor, which extend with increased severity along the course of the brachial nerves. His general health is at present pretty good, but his countenance is sallow, and he is subject to bilious attacks. He first observed the tumor in the axilla two years ago: at the end of eighteen months it was about the size of the fist, but of late has increased more rapidly. At first there was no pain, afterwards pain succeeded any exertion, and within the last six months it has been felt along the arm.

Had a tumor, not very considerable in size, removed from the upper part of his back three years ago. This had never given any pain. Knows of no cause to which to ascribe either tumor.

On the 17th the tumor was removed. The veins bled profusely, and Mr. Cowan was under the necessity of tying four of them. One artery also required a ligature. Much blood was lost, and the patient was greatly exhausted. Mr. Cowan said it was not without reluctance that he had placed ligatures on the veins, nor would he consider the patient out of danger while they remained.

On the 18th, having pain of the lower part of breast, with an accelerated pulse, he was bled to $\frac{3}{4}$ xii. and had a dose of Dover's powder. He had afterwards calomel and opium.

On the 21st was dressed for the first time, and the lips of the wound found adherent. All the ligatures, however, did not come away till the 11th of May, and he was in a few days afterwards dismissed cured.

The tumor weighed ℥v.; it was of a fatty structure, except at some points, where it was of a thick cheesy substance, and here and there little spots of purulent matter were deposited.

CASE IV.—Caroline Anderson, æt. 22, Nov. 16th. Near the sternal extremity of left clavicle is a flattened tumor, about the size

of a child's fist, of an oval shape, firmly attached to the clavicle, and projecting over it considerably both above and below. The integuments are easily moved over it. It is the seat of constant darting pain, so severe as frequently to prevent sleep; aggravated on pressure, and on moving the head or arm, when it extends up the neck and along the arm to the elbow. About six weeks ago felt pain in clavicle, neck, and shoulder; and on examining found a tumor the size of a pea, but cannot say whether or not it was then moveable. It has continued to increase ever since—more rapidly, she thinks, when her work is hard. Never received any injury on the part. Is a kitchen servant, and has frequently heavy lifts; but is not aware of ever having had a strain. Denies having at any period been affected with syphilis. Was married young, and is now a widow. Previously in good general health.

Nov. 17th.—Tumori applicent. Hirudines xx.

19th.—Rep. Hirudines. Tumori applicent. emplastr. cantharid. parvum.

23d.—The blister has been kept open. Tumor is less painful, but increased in size.

Fricetur tumori om. nocte. Unguent. Hyd. Camphorat. 3ss.

Dec. 1st.—Hardness and size of tumor diminishing; pain gone. Pain and numbness of arm, of which she complained some days ago, gone; mouth not affected.

25th.—Mouth sore; tumor diminished.

Omitt. Ung. Hyd.

28th.—App. vesicat. parv. tumori.

January 10th.—Rep. vesicat.

26th.—Tumor discussed.

EDINBURGH ROYAL INFIRMARY.

Formation of New Lip.

CASE I.—A. Cowan, æt. 42. About six years ago a small ulcer appeared upon the under lip, accompanied by lancinating pain and induration of the adjacent parts. A shepherd applied to the sore a plaister, said to be composed of acid vegetable matter. This had the effect of completely destroying the whole under lip.

When admitted, on May 9th, under the care of Mr. Liston, the ulceration had ceased, and the parts were cicatrized. The patient wore a leather bag under the chin, to collect the saliva, the flow of which caused great inconvenience. His speech was also indistinct.

May 10th.—To-day a new lip was formed. A piece of leather of the size and shape of the under-lip was placed under the chin, and a corresponding portion of the integuments was reflected upwards, a considerable attachment being preserved. The cicatrix

was removed by the knife; and the flap, having been twisted round, was adapted to the edges of the wound, and retained by six interrupted sutures. A considerable quantity of tartar, which thickly coated the teeth, had been previously removed.

May 16th.—The sutures have been withdrawn.

May 20th.—The flap is adherent, though somewhat swollen and œdematous, and is supported by a compress and bandage. The wound under the chin is cicatrizing rapidly.

June 6th.—The flap has firmly united, excepting immediately above the attachment, at which point a probe can be readily passed beneath it.

June 7th.—A bistoury having been introduced beneath the non-adhering point of the flap, was carried downwards, so as to divide the attachment, which was then removed by a second incision. The lower part of the flap was laid close to the chin, and retained by a bandage.

June 20th.—The whole of the flap is firmly adherent, but is still rather tumid. The wound under the chin is almost completely cicatrized.

June 21st.—The edges of the flap, which were non-adherent in consequence of the hairs on their surface being twisted inwards, were pared, and a firm compress and bandage applied.

July 8th.—The wound has wholly cicatrized. The patient speaks distinctly, retains his saliva, and his countenance is much improved. Dismissed cured.

CASE II.—E. Hamilton, æt. 44. Three years ago a swelling appeared on the upper part of the left side of the nose, attended with acute pain; a small abscess formed, and was laid open, and an irregular portion of bone, of the size of the point of the fore-finger (probably the nasal process of the superior maxillary bone), was discharged from the abscess six months afterwards. Two years ago she was put under the influence of mercury, without benefit.

May 30th, was admitted under the care of Mr. Liston, with an opening of the size of a shilling on upper and left side of nose, communicating with the cavity of the nostril. The callous edges of the aperture were removed by the knife; a portion of integument was reflected from the forehead, twisted round, and attached by sutures to the edges of the wound, so as to completely occupy the aperture. The edges of the wound on the forehead were approximated by three interrupted sutures.

July 1st.—Since the operation a firm compress and bandage has been applied to the flap, which still continues slightly œdematous. The wound has completely cicatrized.

July 4th.—She is now an out-patient.

GUY'S HOSPITAL.

Case of Willis continued from our last Number, page 287.

THE following are Dr. Hodgkin's notes of the dissection. The inspection was made in the presence of Messrs. B. B. Cooper and E. Cock, at the patient's house.

The body universally of a yellow jaundiced colour. The face was thin, but the muscles were generally well developed, and the subcutaneous fat about the trunk pretty abundant. The abdomen was very little, if at all, distended.

The head was not opened. There were some very slight and partial old pleuritic adhesions near the summit of both lungs, which were emphysematous, from dilatation of the air-cells, but otherwise healthy. The heart was rather large, but in other respects was healthy, as well as the pericardium.

In the abdomen there was no effusion, or any other indication of peritoneal inflammation; and though the tissues were generally rather soft and tender, there was none of that preternatural lacerability of the subserous cellular membrane so generally met with after the operation for the stone; nor was there any purulent or sanguinolent infiltration of that structure. The stomach contained a considerable quantity of dark, brown, dirty mucus. Its lining membrane, of rather a dusky colour, little, if at all, injected, but rather thick and granular, and presenting large open follicles.

The duodenum was likewise thickened, discoloured, and granular. In other parts of the alimentary canal the mucous membrane appeared to be healthy, but its contents were dark and slimy. The liver was generally of a light colour, except where it had acquired a leaden hue from the influence of sulphuretted hydrogen, as in those parts which were in contact with the colon and within the substance of the organ by the sides of the larger biliary ducts. The liver was further mottled in some parts, especially on the convex surface, being of a lightish yellow colour. It appeared to contain a good deal of bile, and was rather soft. The gall-bladder was distended with dark and viscid bile. The spleen was large, of a lightish colour, and soft, rather than turgid. Nothing remarkable was observed in the pancreas.

The kidneys were rather large, soft, and easily lacerated; their tunics separated very easily, leaving the surface of the organ smooth and polished. There were two or three urinous cysts on the left. Where not discoloured by the presence of venous blood, the substance of these organs seemed to be unusually pale, but to be free from the peculiar deposit described by Dr. Bright. Notwithstanding the long period during which the patient had been affected with stricture,

the ureters were so far from being dilated that they were less than of the ordinary size. The bladder was of moderate size and flaccid, and the muscular coat very little, if at all, thickened. The mucous membrane was of a dark olive colour, with very general thickening and abrasion on the summits of all the turgid and elevated points. There were also two or three small sacculi. The bladder contained some dark-coloured viscid mucus, rather than urine, and two small concretions of soft calculous sabulous matter near the pubes. The prostate was not enlarged; there was a clean and good cut through it into the bladder, but there was a very small rag of mucous membrane at the outer side of the incision; it was of no importance, but is mentioned as a matter of curiosity, as the knife had been but once introduced.

ST. GEORGE'S HOSPITAL.

SCARCELY a week elapses without several cases of hysteria in one of its protean forms being sent into the hospital. By far the greater number of the patients thus affected have been previously treated for inflammation, or some other organic disease. As the subject is generally not well understood, we shall take the liberty of reporting a case or two at present, and hope to be enabled to detail some interesting ones hereafter.

CASE I.—*Amenorrhœa—Cough—severe Pains in the Chest and Head.*

Catherine Carey, æt. 16, admitted May 21, 1829, under the care of Dr. Seymour.

The symptoms she labours under now are, delicate appearance and chlorotic complexion; pulse rather languid; tongue moist and whitish; bowels rather confined. She complains of pain over the sternum, increased on walking, standing, or other exertion, but not on making a deep inspiration; frequent hacking cough without expectoration, and not worse at one time than another; distressing pains over the head, aggravated on rising in the mornings, and attended with occasional dimness of vision; no appetite for animal food, which she says makes her sick.

Her illness commenced nearly three months previously with "a bad cold," accompanied with what seems to have been *globus hystericus*. At this time she says she spat blood, but in no great quantity. She applied at a Dispensary, and was cured, or nearly cured, of her cold, &c. when the pains in the chest and head commenced. She had *never menstruated*.

Here was a case where the menses had not yet flowed, and the leading symptoms in the group were clearly nervous. The cough was the only suspicious point about her, but Dr. Seymour was determined to see how it would be affected by emmenagogues and tonics. He accordingly prescribed—

Tinct. Ferr. Ammon. 3ss. Infus. Cascarill. 3x. Tinct. Cascarill. 3j. M. ft. haust. ter die sumend.

Pil. Aloes c. Myrrhâ 3ss. alternis noct. Diæta media.

On the 22d the shower-bath every morning was ordered in addition to the foregoing means, and a plaister of Burgundy pitch was applied to the chest.

26th.—Fatter, and otherwise much improved; *little if any cough; pain in chest much relieved, that in the head nearly gone; tongue clean, bowels open, pulse quick.* She has several times vomited after her breakfast; the catamenia have not appeared.

June 4.—Looks well, but says she has lately experienced more pain in the head; no pain in the chest; a little cough. She thinks the shower-bath agrees with her.

18th.—Bowels confined; rhubarb draught.

22d.—No pain in the chest; has gained flesh and strength; tongue clean; pulse natural, but easily raised from her nervous disposition.

On the 3d of July she left the house at her own request. Though greatly relieved, she could scarcely be said to be cured, as the chlorotic state continued, and the menses had not appeared. The cough, however, was gone, and the pains in the head and chest were gone also, or greatly diminished.

CASE II.—*Menorrhagia and Leucorrhœa—Pain in the Back—Hysterical Gravel and Erysipelas.*

Isabella Davies, æt. 24, admitted June 10, 1829, care of Dr. Seymour.

She complains of excruciating pain in the back, referred to the lumbar vertebra and sacrum; leucorrhœa; pulse 100, skin warm, tongue clean. She says she has gravel in her urine, which is passed with extreme pain; and that she had, indeed has, erysipelas on the left leg. On examination no erysipelas whatever can be found, and nothing unusual exists save the slightest redness imaginable on the skin above the inner ankle. The whole of the left lower extremity, however, is exquisitely tender on pressure, so much so that the patient jumps on the merest touch. There is no emaciation, nothing in the general appearance corresponding with the violent sufferings she professes to endure.

Her menstruation last month was very profuse; she has been examined by an accoucheur, who sent her to the hospital.

R Tinct. Valer. Amm. 3j. Mist. Camph. 3x. ter die.

Ext. Colchici gr. j. Ext. Glycyrrhiz. gr. iv. M. ft. pil. omni nocte sumend. Diæta media.

Next day on examination per vaginam nothing unusual could be found; and on looking at the urine it was seen to be perfectly clear and limpid, and devoid of any thing like gravel!

We saw her again on the 18th, when she looked very well, but declared she was no better. The pains were any where one wished, and as bad as could be! On the 22d she declared that nothing remained but a little uneasiness between the shoulders, and was dismissed cured on that day.

The morbid state of feeling in these unfortunate patients is really surprising; and Mr. Brodie, in his clinical lectures, is in the habit of relating some curious instances of actual "malingering" in individuals, whose rank and station would almost place them above suspicion. There are at present some well-marked cases of hysteria in the house, which being *sub judice*, we forbear to notice. They will form the subject of a future report.

BARON HEURTELOUP'S DEMONSTRATIONS.

To the Editor of the London Medical Gazette.

SIR,

You will very much oblige me by stating, in your next Gazette, that the report (given in the Lancet last week) of the "demonstrations by the Baron Heurteloup," at my house, was done entirely without my knowledge or sanction. Of that part of the report, however, I do not complain, as a very general invitation to meet the Baron, on two occasions, had been given to the principal surgeons in London; and they, I conceive, were at perfect liberty to make more public these demonstrations, in any manner they thought proper. Some individual however, Sir, has taken upon himself, in a most unjustifiable manner, to add, that an operation has been since performed by the Baron at my house, and that "the particulars of this case will appear in due time in this Journal," (the Lancet). That an operation has been performed on a *private patient* of mine, is true; but not only are the details of that operation, as given in the Lancet, extremely incorrect, and therefore manufactured entirely from hearsay, but also that promise of future particulars to be given in that Journal is equally gratuitous and unwarranted. I am, Sir,

Your obedient servant,

ANTHONY WHITE.

Parliament-Street, Aug. 6, 1829.

NOTE FROM MR. AMESBURY.

To the Editor of the London Medical Gazette.

82, Great Surrey-Street,
Aug. 3d, 1829.

SIR,

IN the Medical Gazette for the 1st August is a Clinical Lecture, said to have been deli-

vered by Mr. Key. I beg to inquire whether the insertion of that lecture in its present state is authorized by Mr. Key; and if so, whether that gentleman intends any allusion to me in the following passage, p. 264:—"I have no wish to rank among those who first misrepresent (some unintentionally) his" (Sir Astley Cooper's) "positions" (on fractures of the neck of the thigh-bone), "and then proceed to refute their own statements of his opinions."

As I am the individual, who, I believe, last wrote on Fractures of the Neck of the Thigh-Bone, and as I feel perfectly unconscious of having misrepresented the opinions of any one, I am induced to put these questions, in order to clear myself from the imputation which the lecturer has attempted to cast upon those who are opposed to Sir Astley Cooper's pathological views; and with a hope, that if Mr. Key alludes to me, he will point out, through the medium of your journal, the part of my work where the misrepresentation is said to have been made, so that I may have it in my power to make Sir Astley the only apology to which such an unfortunate circumstance would necessarily lead.

That Mr. Key has read my observations on Fractures of the Upper Third of the Thigh-Bone, and Fractures of Long Standing, in which I have particularly treated of fractures of the cervix femoris, I have little reason to doubt, though it might, perhaps, have been unnecessary; for as early, I believe, as 1821, he was made acquainted with many of the facts and observations on the subject of fractures, which I have since laid before the profession. If any other evidence were needed of Mr. Key's acquaintance with many of my views, it will be found in the use which he has made of them, though without the slightest acknowledgment, in papers published from time to time in the Medical Gazette. The cautious endeavour which he has evinced on these occasions not to give the smallest hint as to the source from which he obtained his information, is, however, a matter of less importance to me than to his pupils and to your readers, whom he must have greatly misled by the garbled manner in which he has detailed those parts of my plans and opinions which he has thought proper to mention.

If Mr. Key should not notice this communication, I shall of course conclude that his insinuation in the above paragraph is directed to some other person, and *not to me*.

The insertion of this in your next number will much oblige,

Sir,
Your obedient servant,
JOSEPH AMESBURY.

[We do not know to whom Mr. Key alluded, and can only pledge ourselves for the accuracy of our report.—E. G.]

DR. HARRISON v. MR. PICKTHORN.

To the Editor of the London Medical Gazette.
Holles-Street, July 31st, 1829.

SIR,

A FRIEND, upon whom I accidentally called this afternoon, put into my hands a copy of your Journal for July 25th, containing some strictures upon my communication of the present month to the Gazette of Health and the Lancet.

My reply to them will be short. Your correspondent observes, "that months before the trial came on, he (Dr. Harrison) was fully aware, that Miss Orton's prescriptions would be produced, *for I sent him due notice by the medical friend who attended him into court, on the morning of the trial*. Let him deny it, if he can." Although I cannot, of course, deny that a commission was given, I declare most positively that it never reached me in any shape, and I challenge your informant to establish the truth of his position, in regard to it, upon something more respectable and trustworthy than his own effrontery.

Concluding that Mr. Tuson, "the medical friend who attended me into court," was the gentleman alluded to, I drove directly to his house, and found him at home. After reading the passage quoted above, he told me, "that the whole statement, as far concerns himself, is erroneous. He remembers perfectly well that Mr. Pickthorn showed him some of Dr. Harrison's prescriptions, but he was never desired to become the bearer of any message. Had the request been made, he should have declined to interfere, having always refused to meddle with other people's affairs, or to embroil himself in their disputes." He then went on to observe, "that so far from believing that these prescriptions were to be exhibited in court, he did not even know that Mr. Pickthorn was a party concerned in the trial till after its commencement."

Thinking it would only be a waste of time to notice the other matters mentioned in your correspondent's letter, before he shall have refuted, first, Mr. Tuson's ample and perspicuous contradiction of his statement; and, secondly, my unqualified denial of the inference drawn from it, in respect to myself, I now conclude my letter, with a request that it may receive an early place in your Gazette.

I am, Sir, yours, &c.

EDW. HARRISON.

[The preceding letter, though dated July 31st, was only received August 5th. We have thought it right to insert it immediately, though it has put us to some inconvenience.]

ERRATUM.

In the leading article of last week, page 285, first line of first column, *for* "the breathing was performed very rapid," read "the breathing was very rapid."

W. WILSON, Printer, 57, Skinner-Street, London.

THE LONDON MEDICAL GAZETTE,

BEING A
WEEKLY JOURNAL

OF
Medicine and the Collateral Sciences.

SATURDAY, AUGUST 15, 1829.

ABSTRACT OF A CLINICAL LECTURE
ON
STRICTURE,

Delivered at Guy's Hospital, August 5, 1829,
By C. A. KEY, Esq.

WILLIAM PARKER, æt. 44, was admitted with stricture June 25, and gives the following account of his complaint:—He had a gonorrhœa at the age of 19, which continued nearly a year, in the form of gleet; when the gleet left him he was not aware of any disorder in the canal, nor did he complain of stricture until six years after. Bougies were then resorted to, but without much benefit. He came into Guy's Hospital about three years ago, in consequence of the canal being nearly closed. Mr. Key dilated the stricture by means of metallic instruments, and he returned into the country (Herefordshire) free from any complaint. He remained well for three years.

At present he is unable to make water except by drops, and with considerable pain. His health is much deranged, his countenance is sallow, and his tongue is covered with a thick white fur. He complains of indigestion, and great uneasiness in the region of the stomach for several hours after each meal; he describes the sensation as if his food remained in the stomach for twelve hours. His mind is exceedingly depressed; he has had diarrhœa for six months past. He is a temperate man, but has worked hard.

An attempt being made to pass a small-sized sound, it was found that the smallest instrument would not enter the stricture.

89.—IV.

Ordered, Infus. Gent. C. ʒiss. Tinct. Catechu. ʒss. Sodæ Subcarb. gr. viij. ter in die.

July 7.—His diarrhœa better. To-day a small sound has, with some difficulty, been passed into the stricture, but to no great distance. To allay the irritation that followed the passage of the instrument, he is ordered to apply some leeches, and to take every six hours a pill containing Cal. gr. j. Opii gr. j. Antimon. Tart. gr. ¼. cum haust. salin.

13th.—The irritation soon subsided, and the pills were discontinued. To take common saline purgatives as may be required.

29th.—A small gum elastic catheter was passed into his bladder yesterday, and in the evening he had a long shivering fit, followed by great heat and thirst. This morning his tongue is thickly furred, and he complains of great pain and heat in the urethra.

Ordered, Calom. gr. iij. Opii gr. j.

30th.—He complains only of his stomach, his fever having subsided.

Sulph. Quin. gr. iv. before each meal.

August 3.—Better in every respect; tongue cleaning, feelings more comfortable, a larger catheter passed and allowed to remain.

GEO. BATCHELOR, æt. 24, contracted a gonorrhœa nine months ago, for which he took mercury and copaiba for six weeks; the former produced salivation. The discharge soon ceased, but he has lately perceived the stream of urine becoming smaller, and now it passes by drops. He complains of much pain in the loins; he has had bougies passed down to the stricture, but not into the

Y

bladder. The stricture (July 15) is found to be not extensive, but impenetrable by a bougie; the bulb is painful on pressure.

Ordered, Ol. Ricini ℥j. Hirudines xij. perinæo et empl. lyttæ.

A bougie passed daily to his stricture.

On 27th leeches and empl. lyttæ repeated.

Aug. 4.—The dresser (Mr. Andrews) succeeded in passing a small sound into the bladder; in the evening of the same day he was attacked with a smart rigor.

On the following day he was found free from fever, and the stream of urine was much improved. The treatment by dilatation to be continued as often as he can bear the introduction of the instrument.

The above account briefly gives the nature of the ailments and the treatment pursued. The cases present many of the ordinary symptoms of stricture of the urethra, and to them I shall confine myself in the observations I have to make.

Stricture is usually attributed, but without much justice, to the employment of injections for the cure of gonorrhœa. If injections are used with proper precaution, and limited to certain cases of gonorrhœa, they cannot have the effect of producing stricture in that part of the canal which we usually find to be the seat of disease. The usual seats of gonorrhœa are two—the lacuna magna of the urethra, or of the upper portion of the canal in which the large lacunæ are situated; and the lower portion of the urethra in the neighbourhood of the bulb or Cowper's glands. When the disease is limited to the former situation, injections cannot be productive of mischief upon the lower part of the canal, if care be taken that the fluid injected does not go beyond the seat of the disease, which is easily done by pressing upon the canal about two inches from its orifice. I am frequently in the practice of ordering injections, and have not been able to trace, in a single instance, that stricture has been the result of their application. In disease of the perineal part of the canal, I think injections are more hazardous, but still not so prejudicial as the long-continued use of the balsam copaiba, and other astringent remedies, which, unless they speedily effect

a cure, or at least a diminution of the discharge, act as irritants, and lay the foundation of chronic inflammation, which generally ends in stricture. If copaiba does good in gonorrhœa, its benefit is soon discovered; but it is worse than useless to persevere with it when a slight discharge remains, over which it seems to have little or no control. When the disease appears to be seated low down the canal, purgative measures tend more to correct the disorder, and are less hazardous, than the use of violent astringents; and the use of the latter ought to be deferred in such cases until all inflammatory symptoms have disappeared.

The circumstances of gonorrhœa attacking these two parts of the canal, and also of stricture being usually confined to these two situations, are presumptive proof that the diseases depend upon affections of the same structures. Gonorrhœa is known to be usually seated in the large lacunæ of the upper part of the canal; and when seated low down in the urethra, it is highly probable that it produces a similar effect on Cowper's glands and their ducts, which are to be regarded only as a cluster of mucous glands, fulfilling the same office as the lacunæ; for we commonly find them to be large when the lacunæ of the urethra are small in size and few in number.

Stricture is rarely situated beyond the termination of the bulb: when an impediment exists to the stream of urine nearer to the prostate gland, it is not produced by what we ordinarily understand by the term stricture. Stricture also rarely extends higher up the canal than about an inch from the point of the bulb: this, it will be perceived, is the exact extent of the ducts of Cowper's glands; and, in an affection of these ducts, will, I apprehend, be found the cause of stricture. Under inflammation of the glandular structure, effusion takes place into the reticular membrane around the canal, between the lining membrane and the corpus spongiosum, and this forms the foundation of a future constriction of the canal. To account for a narrowing of the tube, there is no necessity to have recourse to muscular fibres: in the instance of stricture of an intestine, or of the œsophagus, the source of irritation produces a deposit among the muscular fibres that surround the tube; the fibres

are thus induced to contract, and to assist in the production of a permanent stricture. But a deposit will alone account for a stricture of the urethra without any contractile power of the urethra itself; nor is there reason to believe that the canal possesses *per se* a power of contraction independent of that which the external muscles of the perineum give to it. The deposit of stricture is the result of a slow and long-continued action; as we see in the man Parker, an interval of six years has elapsed between his gonorrhœa and the period when he first discovered the stricture. The deposit at first is plastic, and does not exert any constricting force on the canal; the patient is, therefore, not rendered sensible of any diminution in the size of the stream until some time has elapsed, and has produced the change in the character of the effused matter necessary to produce stricture of the tube: this change is probably similar to what all newly-formed structures more or less undergo; I mean a contraction, generally ascribed to the diminished calibre of the blood-vessels supplying it, or, in other words, a diminution of vascular organization. Whatever be the explanation, the contraction of cicatrices and other recent formations is familiar to us all, and may be applied to the explanation of the phenomena occurring in strictures. It is necessary, in order to produce a complete stricture, that the deposit should entirely surround the tube of the urethra: hence, stricture is so much more rare at the situation of the lacuna magna, when, although a hard and firm deposit is not unfrequently caused by gonorrhœa, it seldom extends around the tube, but is confined to one side only.

In the dissection of strictures, I have often had difficulty in recognizing Cowper's glands, so great is the change which their glandular structure had undergone; and the ducts have been sometimes entirely obliterated, or so blended with the stricture, as to render it impossible to discover their canals.

The numerous phenomena of symptomatic irritation attendant upon strictures I here only allude to, in order to point out to notice the form in which they manifest themselves in the cases above mentioned. In the man Parker, the organs principally affected by the irritation of the disease are the stomach

and bowels, evinced in an extremely morbid condition of tongue, great sense of weight and oppression about the precordia, inability to digest his food, irritable state of intestinal canal, and a remarkable tendency to hypochondriasis. The imperfect performance of one animal function, important to life, cannot long continue without sensible derangement of others. You may observe the improvement that has taken place in this man's appearance and health since his stricture has been overcome. The occurrence of rigors, subsequently to the passage of an instrument, is also worthy of remark.

Rigor appears to be the result of an impression upon the system, common to many disorders beside stricture. It is a peculiar form, in which the depressing effects of a morbid cause shew themselves. It is more than probable that all morbid causes have in the first instance a depressing effect upon the nervous system, manifesting itself in different forms according to the part of the system to which their action is confined, or on which it is more particularly exerted. The effect of merely passing a bougie is not unfrequently to make a patient instantly faint: here the depressing effect is exerted chiefly on the brain and its circulation: were the pain produced by a bougie greater than in such cases is usually experienced, the heart's action would be excited, and fainting probably would be prevented. It is, therefore, not pain, but the peculiar depressing effect produced by the cause (whatever it may be) that induces syncope. Such may be also the operation of the commencement of suppurative action, which in its acute form is rarely unattended with rigor more or less severe. The marsh miasma of ague may be supposed to exert the same depressing effect upon the system. In rigor the depression is limited to the surface of the body, and to the heart; the latter acts with diminished force, and the skin, no longer supplied with the fluid necessary to support its temperature, becomes chilled: under the subsequent reaction, the congestion of the deeper vessels becomes relieved, and the hot and sweating stages succeed. In neither of these cases of stricture, you will observe, did the rigors come on until the instrument had been introduced into the bladder. The previous attempt to pass the instrument had been

productive of considerable pain and irritation : pressure had been made upon the stricture so as to give the patient uneasiness in the perineum, and induce some degree of fever, but no rigor followed ; and yet on the subsequent attempt which succeeded, much less difficulty was met with, and the patient experienced much less pain, but severe and long-continued rigors ensued. The same effect took place in the instance of Batchelor ; nothing like rigor came on until the instrument had been passed through the stricture. It is the dilatation of the stricture that causes the rigor : the strictured portion of the canal being morbidly sensible, is alive to any cause of irritation, but more especially to the distention which the instrument produces. This should teach us to be gentle in our measures for overcoming strictures, and to avoid violence, which can only be productive of harm.

Rigor is not only a consequence of the dilatation of stricture, but also sometimes attends as a symptomatic character of the complaint. Its periods of accession are uncertain, observing no regular period, as the condition of the bladder and canal, which gives rise to it, necessarily varies. The usual period of its coming on is when the bladder becomes distended, and the urine finds unusual difficulty in its passage through the strictured portion of urethra ; any excess, or cold, are liable to induce it, by affecting the stricture and increasing its irritability. The complaint occasionally assumes the form of an irregular intermittent, and yields to the treatment that succeeds in other forms of intermittent fever. The effect, however, of the quinine, or arsenic, is only temporary. I am attending a man, about thirty years of age, who has been subject, during the last three years, to repeated attacks of rigor, which had been regarded as a marsh ague, and treated accordingly with quinine. The small quantity of urine which he passed was attributed to the fever, and the existence of stricture was not known. By the agency of this powerful remedy the attacks were for a time warded off, but quickly returned. As soon as the stricture was discovered to be the source, and dilated by sounds, the paroxysms immediately left him ; he has not had one rigor since the instrument entered the bladder. In this instance the rigors were produced by a different cause from

that in Parker's case ; and the very means that induced them in him, have in the last case proved the source of relief.

The general treatment of stricture I will not notice further at present than to observe, that the cure of these two cases will be effected by the process of dilatation, aided, if necessary, by the use of the argenti nitras. In regard to the former, you cannot employ too much caution in the first introduction of the instrument, and to forbear all forcible pressure until you are certain that the point of the instrument is in the stricture. If this caution be adhered to, the risk of making false passages by the side of the canal will be avoided, and the cure of the stricture will proceed rapidly. There is some nicety required in this : it is difficult, until it is gained by some experience, to know by the sensation where the orifice of the stricture is situated. In old-standing strictures there is usually a firm, or, if I may so term it, a callous portion of canal, which feels like a prominence when the instrument reaches it. It is generally in the centre and most unyielding part of this firm stricture that the passage of the canal lies ; and if the instrument be pressed against the most yielding part of it, it will generally be found to have passed by the side of the stricture, and to have left the canal altogether. The instrument which I use for the purpose of ascertaining the presence and condition of a stricture, is a metallic sound. With no other instrument can you so well satisfy yourself ; as a bougie bends and yields to any slight impediment, and very often appears to indicate the existence of a stricture when it really does not exist. When discovered, a stricture may be as easily, and in many cases better, dilated by a flexible than by a metallic instrument. So much difficulty, and so much irritation, in one of these cases, attended the passage of the instrument, that it was deemed expedient to leave a flexible catheter in the bladder. Such a proceeding is advisable only when the stricture is difficult to overcome, and when the regular attempt to pass the sound, or bougie, is likely to be often foiled ; and under excessive irritation, arising from its first or second introduction, it is often prudent to leave a flexible catheter in the stricture, if the patient is able to bear

it; for a stricture of this irritable class is disposed to contract as soon as the bougie is removed, and the same rigors attend the subsequent introduction of the instrument, which may be prevented by keeping the stricture distended.

The employment of the argenti nitras in the treatment of stricture, I am not disposed to regard with that abhorrence which some entertain towards it. The name of caustic is not an inviting one, and the idea of burning a stricture away is prepossessing neither to patient nor surgeon. The argenti nitras, however, does not produce its effect as a cautery; it destroys the surface, it is true, to which it is applied; but only the surface. Its destructive effects go no deeper than the mere superficies of the part with which it comes in contact; but its beneficial effects extend beneath the surface; it there acts as an astringent, and induces the absorbents to remove the effused mass that surrounds the canal. Its beneficial action is thus twofold; it destroys the sensitive and irritable surface of the canal, and stimulates the vessels to remove the stricture. The argenti nitras is not applied to a nebulous cornea merely as a caustic, but as a healthy stimulant; with the same view it is applied to an ulcer of the cornea; it excites a healthy action by its stimulating property, and assists in filling up the ulcer. The idea entertained respecting the agency of this valuable remedy, was expressed in a question put to me the other day, whether the mucous membrane be reproduced after it is destroyed by use of the caustic? Were the mucous membrane wholly destroyed, it is probable that it would not be regenerated; but the circumstance of mucous membranes being found entire, after the eschar is detached, shews that its destructive effects do not reach below the surface.

The ordinary mode in which caustic is applied by means of a bougie, is not wholly free from objection. The uncertainty of its application to the stricture itself, the impossibility of applying it to the sides of the strictured portion of the canal, and the risk of destroying a healthy portion of the canal anterior to the stricture by its repeated application, afford just grounds for doubting its good effects as a remedy in stricture. By means of an instrument, such as I now shew you, you may ap-

ply it to the sides of the canal without any risk of opening the healthy part of the urethra. It is made much after the manner of Ducamp's porte-caustique; it consists of a hollow bougie and a silver stilette, to the end of which is affixed a small tube of platina, open at the side, into which tube a small stick of caustic is introduced. Having ascertained that the stricture will allow a small bougie, or sound, to enter, the hollow gum catheter is then passed down to the stricture, and the small platina tube is introduced through it. By giving the tube one circumvolution, the whole circumference of the stricture is touched with the nitrate of silver.

OBSERVATIONS

ON THE

CHORDA TYMPANI AND THE TYMPANINE NERVE OF THE GLOSSOPHARYNGEUS.

By JOSEPH SWAN, Esq.

THERE are many intricate nerves in the animal body, whose uses have not been much noticed; and although it is indeed difficult to discover these precisely, yet we may be allowed to inquire respecting them, and thus, perhaps, be enabled to arrive at rational and probable conclusions.

I have lately made some observations on a disease of the tympanum, and particularly as it involves the nerves distributed in its interior; and as these form so important a feature in this curious structure, it may not be altogether without interest to make a few remarks on their uses.

The singularity of the course of the chorda tympani, its passage over the malleus and across the membrana tympani, as well as its conjunction with the gustatory nerve and the portio dura, must frequently have excited the attention of the anatomist.

It would have been easy for the chorda tympani to have passed from the portio dura to the gustatory nerve without crossing the membrana tympani, and it must, therefore, have been placed in its unerring situation to answer a specific purpose. When a nerve is peculiarly connected in any structure, it is generally so either for receiving an

excitement from the parts it is in contact with, or for giving them a due and seasonable admonition, for the prevention of over-distention and other inconveniences, as is exemplified in the connexion of the nerves with the blood-vessels, with the bladder, and other parts. I conceive that the chorda tympani is connected with the membrana tympani, that it may receive such an impulse, both from the membrana tympani and the malleus, as may be conveyed to the portio dura and the gustatory nerve; and thus the voice and features, as in singing, would be associated with the action of the membrana tympani, and particularly when the organ of hearing is excited by music: it also prevents a too forcible extension of the membrana tympani, by its feeling any considerable impulse, either from the external air, or from that admitted by the Eustachian tube, and thus counteracts any undue distention of the tympanum. In this function the tympanine branches of the glosso-pharyngeus form an important assistance. Do we not expire as much as possible when we expect a very loud sound, and thus keep the tympanum nearly empty, so that its membrane may be unstretched; and, on the contrary, when we wish to hear acutely, do we not inspire more forcibly than ordinary, and hold in the breath that the tympanum may be sufficiently distended? I conceive it is through the agency of these nerves that these different states are so nicely adjusted, and the proper quantity of air to be contained in the tympanum is determined, and particularly by the excitement conveyed by them to the muscular nerves with which they are connected.

I conceive the chorda tympani communicates with the gustatory nerve and the portio dura; that there may be a due consent between the actions of the tongue and the apparatus of the tympanum, for the purpose of modifying the voice; and that other nerves, whose functions I will hereafter consider, assist in the same operation. This distribution of the nerves in the tympanum makes it unnecessary for a person to listen to the sound of his own voice, as attention to speaking and hearing at the same time would interfere with both operations. It is also greatly advantageous to people who are very deaf, and frequently enables them to speak so

well. It may be asked why the chorda tympani did not rather communicate with the ninth, which is the nerve through which the actions of the tongue are directed, instead of that which gives it sensibility. I conceive that the nice adaptation of the tongue to the other parts must be very essential for the production of language, and this would be better performed by the nerve of sensation than that of motion; and as there is a sufficient communication between the two, which may assist in producing a proper consent for the completion of articulation, so the union with either might have answered in this point of view only; but as it was also necessary to keep up a sufficient correspondence between the surface of the tongue and the tympanum, and as a nerve having sensible qualities would be required, so the present arrangement would be determined on, and particularly as the ninth appears to preside over muscular action only. It may be said there was no need for the union of the chorda tympani with the portio dura, to answer the purposes I have attributed to it; but it appears to be necessary that there should be this communication, that the auditory nerve, the gustatory, and the portio dura, as producing expression and assisting in perfecting the voice, should all at the same instant be in a state of sympathy, as they must be more or less in action together to produce that corresponding state of the features, the hearing and articulation, which are generally observed in the human subject during the act of speaking; and it is partly for this purpose too that there exists the union between the portio mollis and portio dura. As the ears of many animals are furnished likewise with the chorda tympani, it perhaps may be objected that the tongue has very little power in the formation of sounds uttered by them, and therefore this nerve answers some other purpose. The sounds of animals are, indeed, principally guttural, but are, nevertheless, modified by the action of the mouth. But it might with as much reason be objected that the nerves of the lips have very little influence in the production of speech, because there are precisely the same nerves in animals.

The use of the tympanine nerve of the glosso-pharyngeus appears to be, that of giving sensibility to the tympanum; and it, together with the chorda

tympani, is distributed to this part, that there may be a corresponding state between its membranous lining and that of the tongue and throat.

The tympanine branch of the glosso-pharyngeus exists in the same beautiful manner in animals, and we must therefore conclude that it is formed principally for the functions of the tympanum, and particularly as the internal ear in man and the mammalia have so great a resemblance to each other.

It may appear singular that the chorda tympani should communicate with the gustatory nerve, which supplies the anterior surface of the tongue; and that the glosso-pharyngeus, which supplies its posterior surface, should also send a branch to be distributed on the tympanum. I presume the distinction is made that the chorda tympani may associate the anterior part of the tongue with the ear, as the organ of speech; and the tympanine branch of the glosso-pharyngeus with its posterior part, as being more connected with the voice. There can be no good reason for supposing that the chorda tympani has any more to do with the perfection of taste than the tympanine branches of the glosso-pharyngeus; indeed the circumstance of the two surfaces of the ear having a communication with both the anterior and posterior surface of the tongue, which are endowed with properties in some respects very dissimilar, renders it probable in the highest degree that each of these nervous communications exists entirely for promoting functions connected with hearing.

6, Tavistock-Square,
Aug. 4, 1829.

FATAL CASE OF STRICTURE OF THE INTESTINE—

Curious Elongation—of the Rectum?

By FRANCIS GODRICH.

JULY 22. — Griffiths, æt. 75, complains of distention and slight occasional pains over the whole surface of the abdomen; has been very healthy up to the present period, excepting that the bowels have, for years past, been in a state of frequent and almost unconquerable constipation. He now says, "my bowels have not acted these last five days, and then so sparingly as to

afford me no relief—I cannot say when they were freely opened." Has taken this morning five grains of calomel, and a full dose of castor oil; pulse full, not accelerated.

V. S. ad deliquium, et capiat pilulam sequentem secund. quaque hora donec alvus soluta fuerit.

R. Ol. Croton. $\mathfrak{m}\mathfrak{j}$. Pulv. Rhei gr. ij. M. et fiat pilula.

Injeciatur enema purgans sæpe.

Evening.—Five minims of croton oil have been taken without effect; bowels greatly distended; begins to complain of sickness, and to reject the pills; pulse full, 100; pain occasionally very intense.

Repetatur venæsectio ut. autea.

R. Hydr. Submur. et Extract Colocynth. Compos. aa. $\mathfrak{z}\mathfrak{ss}$. Ol. Croton. $\mathfrak{m}\mathfrak{v}\mathfrak{j}$. M. et divide in pilulas xij. quarum sumantur ij. 2da. quaq. hora superb. haust. sequent.

R. Mag. Sulph. $\mathfrak{z}\mathfrak{i}\mathfrak{j}$. Aq. Menth. P. $\mathfrak{z}\mathfrak{i}\mathfrak{ss}$. M. ft. haust. Cont. enemata.

Twelve P.M.—Has retained but an occasional dose of the medicine; very restless; flying pains in the abdomen; the whole alimentary canal enormously distended. He is now so constantly sick, after taking either pill or fluid, that he refuses every thing. He swallowed half a pound of quicksilver. The bowels to be stimulated with clysters, and fomented.

23.—Saw him with Mr. Holberton; he had passed a more comfortable night, occasionally sleeping; complains of but little pain.

Capiat Hydr. Sub. $\mathfrak{z}\mathfrak{i}$. ex Dect Hordei $\mathfrak{z}\mathfrak{ss}$. 2dis horis.

He took several doses of the calomel, became gradually worse, and died early on the following morning.

The body was examined by Mr. Howship and myself twenty-four hours after death. The stomach and small intestines appeared healthy; the large intestines so much distended, that scarcely any traces of the longitudinal bands could be discovered; the remains of old inflammatory action through the whole course of their mucous lining, which was studded with little white excavations, resembling small ulcerations. The bladder much enlarged, but presenting no appearance of disease. The prostate three times its usual size.

In Mr. Lloyd's cross-examination in Mr. Van Butchell's case, he is reported to have replied to a question from Mr.

Broderick as to the utmost length of the rectum, that it was impossible it could be ten inches. If the rectum commence at the termination of the sigmoid flexure of the colon, it was in this case at least one yard in length, of its usual size in diameter; about six inches above the sacrum it was so much contracted as to admit the tip of the finger with the greatest difficulty;—above the stricture the bowel was enormously distended, and gorged with fæcal matter. The quicksilver had found its way into the sigmoid flexure.

Grove House, Little Chelsea,
July 30, 1829.

ABSORBENT SYSTEM IN SAILORS.

To the Editor of the London Medical Gazette.

Halifax, Yorkshire,
August 2, 1829.

SIR,

SINCE a communication I sent you in July 1828 was deemed worthy of insertion in the valuable pages of your Gazette, I am induced to become again a candidate for the publicity of the following remarks on the pathology of the absorbent system of sailors, which is a subject equally new, interesting, and deserving of accurate investigation; whilst they may elicit further light, and probably be of some practical use to my fellow tyro naval surgeons.

I am, Sir,

Your obedient humble servant,

W. ALEXANDER.

Having frequently noticed in seamen a peculiar disposition in their diseases to terminate in effusion, as well as having had the fact pointed out to me by others whose experience exceeded my own, it became my inquiry to endeavour to ascertain the cause of so curious a phenomenon; and with this view I instituted a series of experiments to aid me in solving this matter. I observed it to be a very common result to prior inflammation, sympathy of organic mischief, obstruction, accidental local injuries, and sometimes to a constitutional taint or affection.

The object of this sheet, however, I may premise, is to prove an evident want of activity in the absorbent vessels; and to give a rational hypothesis as to the cause which thus often pre-

vents the purposes of nature being fulfilled. To attain this end we must consider the quality and ingredients which enter into the composition of the food of sailors, their habits, and the chemical and natural properties of their blood.

I will take for granted, what none of any considerable practical observation with this class of men will be disposed to deny, that there is a singular sluggishness in those vessels which are designed to regulate secretion, prevent morbid accumulations, and repair loss. This may be seen in a healthy as well as morbid condition of the body, whether the fluid be effused from local injury, functional or organic disease. It occurs in young men, as well as those whose shattered constitutions would more readily account for it. A bruise, or crush, is followed by swelling, which continues for a long time, as does the discoloration attendant on extravasation; and glands once inflamed, particularly those of the groin, seldom, if ever, are restored to their original size, but remain hard and indurated. Many are the cases, too, which prove almost impenetrable to the introduction of mercury into the system. The sailor is constantly suffering from boils and phlegmonous abscess; to dysentery continually succeeds anasarca of the extremities; to phrenitis and epilepsy, water in the ventricles of the brain; to ophthalmia, morbid turgescence of the cornea; and so on; and to what must these be ascribed? there is some cause, surely, operating either to deprave the blood, so giving a morbid increased secretion to the external tubes, or there must be a defect of power in the absorbents, so as to render them unable to keep up the equilibrium.

The diet of seamen will vary considerably in a long cruize or voyage, or a short one; in the one case they have fresh vegetables, whilst in the former they almost necessarily are without these antiscorbutics, and their place is but ill supplied by lime juice and peas: they therefore live on salt beef or pork, with biscuit, as their chief aliment, of which they partake three times a day. And as I have ascertained by the experiments and chemical tests above referred to, (which will form matter for a future communication, as I cannot trespass further at present on your space), that these tend to impoverish the blood, and partly from

this cause deprive it of its stimulating effects on the whole nervous appendage, we may be prepared therefore to expect that the absorbents partaking of the general infirmity being but partially supplied with nervous energy, do not perform their function in a natural or active manner.

The blood of several individuals was examined; they were not suffering from acute disease, and had been at sea three months and a half. In three out of four the serum bore to the cruor a proportion of 7 to 2, and the weight of the whole $1\frac{20}{100}$, taking water as unity. When agitated till cool it continued very liquid, and nothing adhered to the glass rod used in stirring it—indicating a want of fibrin; taste very saline and alkaline, changing litmus paper and syrup of violets to a green, even after a small quantity of acid had been added. A small quantity of serum, exposed to heat, was little coagulated, but flakes swimming rendered it muddy and opaque. The crassamentum being evaporated to dryness, presented a brittle crystalline appearance, easily pounded, and taste resembling bread crust, with a trace of sweetness and salt. From the hints already given, it will be observed that the blood becomes changed by a ship's forecastle fare, whilst the cases of two dogs further establish the conclusions we are arrived at, and will be given at a future time.

Another circumstance which will also favor my opinion as to the nature of the change undergone in the blood, is the fact (which I consider as unfrequent with sailors as stone in the bladder), viz. that they are not subject to obesity whilst on sea diet. It is well known that there never was any thing of literary value written at sea, and this may be ascribed to a deficiency of nervous activity from the same cause. For the present we must be content with saying that the absorbents are deficient in activity, arising from a particular diet operating on the blood primarily, and this fluid on the nervous energy.

It will be rightly conjectured, that as a class, sailors do not bear bleeding well, or mercurials; nor do these measures appear to have the usual effects on the system of vessels which forms the subject of this communication; whilst a stimulant and generous diet, where there is no acute inflammation going on, encouragement, gentle exercise, and free air, answer much better.

ANEURISM OF THE ABDOMINAL AORTA.

To the Editor of the London Medical Gazette.

SIR,

As the following case may prove interesting to the readers of your valuable and widely circulating Journal, I take the opportunity of transmitting it to you for insertion.—I am, Sir,

Your obedient servant,

CHARLES HARLAND.

Stafford, August 3, 1829.

Adam Atherways, æt. 38, of a naturally athletic frame, was admitted into the Stafford County Infirmary some time ago, under the care of one of the physicians of the institution. The predominating symptoms appeared more indicative of dyspepsia, or functional derangement, than of organic malformation, or the existence of any signal disease; save that, after taking food, nausea became so oppressively urgent as to render him totally incapable of retaining the ingesta on his stomach. His countenance was pallid; the pulse little exceeded the natural standard, and was without intermission or any marked character; the belly habitually torpid, and he had a constant sensation of weight, hardly amounting to pain, throughout the abdomen, which was slightly tumefied. Neither pulsation nor fluctuation was recognized. He generally lay in a bent position, the supine being uneasy, a circumstance which gave the idea of pyloric disease. These were accompanied with some other symptoms, but none of intrinsic importance. Notwithstanding this, however, general attenuation was progressive, and he died, leaving no positive cause to be alleged for his dissolution.

On opening the abdominal cavity, for the post mortem examination, a large clot of grumous blood was seen, extending from the left hypochondriac, through the umbilical, and terminating low down in the left iliac region. The ascending and transverse arch of the colon was extremely distended with gas and fæcal matter. The descending portion was compressed by a tumor against the parietes of the abdomen; it was necessarily very small, its calibre not being nearly so large as the duodenum. The pancreas and spleen were much altered in shape and size; the

latter was analogous to that morbid state resulting from inflammation, which Pemberton has described the liver occasionally to assume: "the structure being destroyed, so that it resembled a bag containing coagulated blood." The psoas magnus also was much diminished by absorption, produced from the pressure of the adjacent tumor. The stomach, liver, and other viscera, were of healthy appearance. On opening the tumor, which was enveloped in a thin and glossy sac, the striæ occurrent in aneurism were palpable; and as the coagula were broken up with the greatest difficulty in the most depending part, their deposition must, judging from this fact, have been of long standing. On examining the aorta, at the distance of about two inches from its exit through the crura of the diaphragm, it was seen perforated on its anterior surface one inch and a half in length, and about three lines in breadth; for a considerable space round which the coats of the vessel were diseased: nothing else was prominently remarkable. The contents of the thorax were healthy, and the arterial system presented no other disease, such as is usually the case when one aneurism is found. What appears remarkable in the above case is, that nothing happened to lead to the suspicion of the existing disease, which, in certain situations, must ever remain one of "opprobria medicorum."

EXCISION OF THE SUPERIOR MAXILLARY BONE FOR OSTEO-SARCOMA.

To the Editor of the London Medical Gazette.

London, July 29, 1829.

SIR,

IN Mr. Syme's case of excision of the superior maxillary bone for osteo-sarcoma, published in the Edinburgh Medical and Surgical Journal for this month, and copied into the Medical Gazette, he remarks that "the result of this disease, whether allowed to follow its own course, or attempts are made to arrest its progress, by digging out the morbid growth, has hitherto been uniformly fatal." This statement is no doubt correct with

reference to recorded cases. The following, therefore, in which an operation has succeeded, (and I believe at present unpublished, at least in this country,) may not be uninteresting. Passing a short time at Lyons, in the course of last summer (July), I visited the extensive hospital on the bank of the Rhone, and made one in the train of M. Gensoul, Chirurgien-en-chef. Seeing that I was an Englishman, he very politely pointed out several interesting cases, and explained the mode of action of some ingenious contrivances for fractures, &c. employed there. After the visit, I accompanied him to his apartments in the hospital, to see a small collection of diseased structures, which he had preserved.

Among others, he produced a specimen of osteo-sarcoma of the maxilla superior of the left side, which he had extirpated some months previously, together with the greater portion of the maxilla. The method pursued was, to use his own expression, "chiseling" out the disease; and I was astonished to hear him say, it was completed with scarcely any hemorrhage, no vessels requiring ligature after the superficial branches divided by the first incisions were secured. The mass excised was of considerable thickness, and contained six teeth, the farthest incisor and five beyond. The patient recovered without any thing remarkable occurring, and M. Gensoul exhibited a drawing taken when he left the hospital, in which, though the scar presented rather a formidable appearance, the deformity in outline was not very considerable. He did not expect any return of the disease.

M. G. also mentioned a second case of the same kind, which he had operated on since the former, and with an equally favourable result. The tumor was smaller, and had not been preserved. This patient, however, had but just left the hospital.

If you think the above imperfect account worth insertion in the Gazette, it is entirely at your service.

I am, Sir,

Yours very respectfully,

H. T. C.*

* We shall be glad to have an abstract of the Thesis to which our correspondent alludes in his note to us.—Ed. G.

ADDRESS TO PARLIAMENT.

AN ADDRESS

TO THE

Members of both Houses of Parliament,

ON THE

Legislative Measures necessary for providing an adequate Supply of Human Bodies for the Purposes of Anatomical Instruction.

A MEASURE of vast importance to the welfare of the community must engage your consideration in the next session of parliament; and however you may think proper to dispose of it, it is desirable at least that you approach the discussion with some better preparation than mere popular prejudice, or the excitement of feelings however amiable and praiseworthy, can supply. It is a subject which calls no less for the best powers of the understanding than for the best feelings of the heart; and unless both act consentaneously, your legislative procedures must fail of their desired effect; for not even the all-powerful authority of parliament can control human events, when either sound judgment is disregarded or right feeling violated.

My object in troubling you with this brief address is to lead you to contemplate this interesting and most important topic in such a point of view as shall best direct you in legislating so as to accomplish the ends for which your interposition is required. These are, to supply an acknowledged and imperative demand, with the least possible outrage of private or public feeling. There is a want to provide for, which cannot be overlooked or resisted; and there are evils to remove, attendant on the present modes of supply, which have proved of great and appalling magnitude. In devising measures suited to ensure the accomplishment of both ends, you will need the best powers of your intellect, guided by a clear conception of all the elements which ought to enter into your computation—and while you evince a just regard for all such feelings and prejudices as may obstruct your purposes, you must especially guard against the weakness, which, yielding to these prejudices, and estimating them more highly than they merit, would sacrifice to a false humanity and sickly sensibility some of the best interests of the living world.

It shall be my endeavour, in this address, so to arrange the argument as to satisfy your minds respecting the conclusion at which unprejudiced reason must arrive.

The first point to determine is, the necessity of human dissection; and on this I may, happily, be very brief.—Independently of the conviction impressed by ordinary observation on the common sense of all reflecting and intelligent minds, the evidence already submitted to parliament on this head is perfectly conclusive, and of this necessity no doubt appears now to be entertained. If the dead be not dissected, the living must be mangled—while medical science, instead of progressively improving, must inevitably retrograde; and they who regard human dissection with so much horror, must, in yielding to their repugnance, be content to abide the alternative. Right feeling and sound judgment will hardly hesitate to which side to incline. The necessity being admitted then, argument is only required to shew how the want may be best supplied; and in this discussion the whole question becomes embraced.

Some preliminary points must be settled in order to regulate certain feelings which insensibly influence the mind in considering this subject:—Human dissection is very generally regarded as something in itself injurious and objectionable. It must be worth while to inquire what reasonable grounds there are for this conception; and here I cannot do better than give the heads of a dissertation contained in the last testament of a distinguished physician, who, by his will, required that his own body should be dissected, and its skeleton preserved. In this Essay, embodied in his will, he recapitulates the various modes resorted to in successive ages, and by different nations, for disposing of the human remains. He represents, that after death, the human body, if left to itself, becomes a mass of deformity—losing every trace of its former appearance—loathsome to the sight—disgusting to the touch—and intolerably disagreeable to the smell—as well as highly dangerous in producing some of the most malignant disorders to which human nature is liable. Simple interment; deposition in tombs and mausoleums; embalming; burning, so as to preserve the ashes; are noticed as means severally resorted to. He next

dwells on the inestimable benefits which mankind derive from the cultivation of medical and surgical science; shews how indispensable to this culture is human dissection; and concludes with establishing, that, whether as regards the body itself or the uses to which it is convertible, anatomical dissection is the mode of disposal least revolting to natural and unbiassed feeling, and most conducive to the benefit of survivors. Of this able and eloquent appeal, I have given but a hasty and very meagre sketch. It may suffice, however, to induce reflection; to beget some reasonable doubt whether anatomical dissection, as compared with the other processes by which human remains become ultimately resolved into their original dust, be so very horrible, revolting, and unnatural, as weak minds, influenced by prevailing prejudice, are disposed to regard it. If human dissection is to be prohibited by law; if the cultivation of one of the most valuable sciences is to be rendered impracticable; if human health is, in its numberless and imminent perils, to be entrusted to gross ignorance and incompetency, and constructive murder to be thus promoted by the very fiat of the legislature—for "*occidit qui non servat*"—in the name of common sense, let some better reason be assigned for such a tissue of evils, than imputed injury inflicted on the lifeless and unconscious body; which, in being rendered conducive to the extension of knowledge, and the welfare of the human race, cannot, by any sound and well-governed mind, be considered as subjected either to injury or dishonour. To decay the human remains ever must, and ought to be, consigned. Were it even practicable to preserve them from decomposition; were the art of embalming so perfect as, instead of the shapeless and blackened mass of deformity which the mummy exhibits, to present the inanimate body in all the freshness of life—no visionary, I apprehend, would seriously contemplate that all should be thus rescued from that great change which the laws of nature demand, and which the law of God has denounced as the lot of man by the awful judgment, "*Dust thou art, and unto dust thou shalt return.*"

It is obvious, that if such insane reverence for putrescent flesh and bones were ever to be carried to the extreme

of rendering embalming a general practice—and even to this absurdity excited feelings, unrestrained by judgment, directly tend—the living must, in time, give place to the dead; for the world, spacious as it is, could not contain them. If, then, the body, when life has departed, is to be consigned to decay, it will be difficult for the opponents of anatomical research to assign one valid reason, founded on the respect due to the body itself, why it should not be rendered subservient to the relief of human suffering, by being submitted to anatomical dissection.

The subject, thus disencumbered of one misconception, which, however unconsciously, exerts a certain influence over the minds of those who give it only a superficial consideration, comes at length to be argued on the only grounds on which a single valid reason can be urged against the unlimited use of human bodies for the purposes of anatomy, namely, the feelings of surviving relatives and friends.

These feelings are entitled to the utmost respect, and nothing can be farther from my thoughts than to breathe a sentiment in their derogation. Founded in the best propensities of our nature—connected inseparably with our purest emotions and kindest dispositions—with all the endearing ties that bind us to life, and all the virtuous tendencies that render us amiable and estimable in our progress through it; whatever would tend to extinguish or deaden them, would be an irreparable evil, debasing the moral condition of man, and unfitting him for the enjoyment of all true happiness. Attachment to the lifeless remains of those who were once dear, is so inherent, that it must have been implanted in us by the hand of our Maker for other purposes than to be suppressed or extinguished. Like all our propensities, emotions, and passions, however, it requires to be subjected to the control of reason, else its excess must be productive of evil, such as our very highest virtues are prone to when unrestrained.

I have expressed myself thus strongly on the justifiableness of these feelings, and the respect due to them, to shew that I am not misled by zeal for a cherished object into either denying or disregarding them.

I wish also to premise, that I recognise them as existing in all ranks of

society—in the lowest, equally as in the most exalted; and that I have no disposition to violate them when excited in the humblest bosom. Wherever they reside, they are sacred to me; and if anatomical science were to demand any great or signal outrage of them among any class of the community, I fear that, however my judgment might pronounce, my own feelings would recoil from urging any measures that could inflict such intense pain. It is my firm persuasion of this evil being readily avoidable, that impels me to advocate legal provisions, which, in ministering to a great public exigency, reduce the mental distress occasioned to the lowest possible point—to one, indeed, so minute and insignificant, as not to be worthy of impeding for a moment that vast good which the free cultivation of anatomy is calculated to promote.

The following recapitulation will shew how far we have advanced in our argument:—

Medical science is indispensable to the welfare of mankind. To its diffusion and extension anatomy is essential. This cannot be cultivated adequately by any means, save by the actual dissection of human bodies. From such appropriation these bodies suffer no injury or indignity.

Under the existing laws of England, a supply of them cannot be legally obtained; while these laws, with glaring inconsistency, enjoin a knowledge of anatomy as indispensable to every medical practitioner, and visit the want of it with severe penalties! The interposition of the legislature, therefore, is loudly demanded for rendering to the cultivation of anatomy whatever facilities their wisdom may be able to devise.

Thus we at length reach the practical issue to which all the foregoing reasonings are preparatory, namely, how to provide a supply of human bodies adequate to the wants of the anatomist, and with the least possible outrage of private or public feeling.

It has been admitted that the feelings which revolt from dissection of the bodies of relatives or friends, are inherent in our nature—implanted there for wise purposes—amiable in themselves—conducive to virtue—and that they ought not to be contemned or slighted. It has been further acknowledged that they pervade all ranks of society, and

are entitled to respect equally in the poor as in the rich.

But it has also been shewn that mere dissection is no injury or indignity to the body subjected to it; and that, were it not for the feelings of surviving relatives and friends, it would be perfectly unobjectionable. Regard to these feelings, then, is the only obstacle opposed to what the wants of society loudly call for; which leads us now to consider the various modes by which it is possible for this great public exigency to be supplied.

Of these modes, so far as regards the outrage of private and public feeling, exhumation is the worst and most objectionable. The actual evils attending it have been so fully displayed in the evidence given before Parliament, that it is quite sufficient merely to advert to them. Independently of all other objections, and looking to the violation of private feeling alone, it is clear that the sufferings thence arising are extended incalculably beyond what the actual exhumation practised need give rise to. Relatively to the whole amount of interments, the bodies exhumated are few and inconsiderable; but for each body thus stolen, hundreds, nay thousands, of survivors are subjected to all the pain of doubt and anxious apprehension. The lot falls on but few, but it may light on any; and thus all who can by possibility be affected by it, are doomed to a misery acute and protracted, and which is additionally harassing from the very uncertainty that must in numberless instances remain, whether or not any cause of apprehension really existed. To preserve the tranquillity of the tomb—to ensure the undisturbed repose of those who are once consigned to its precincts—to release the minds of anxious relatives and friends from the indescribable alarm that now so generally pervades them—are consummations greatly to be wished, and which never can be effectually secured, save by devising some better mode by which subjects for dissection can be adequately supplied. So long as a great public exigency remains unprovided for by legal and justifiable means, will the illegal and most objectionable supply continue. Nothing can prevent this. Guard as you may the sanctuaries of the dead, the wretched minister of exhumation will still find means to invade their

privacy—elude all your vigilance—defeat all your precautions. The necessity which forces him on doing so, ministers to a trade the most vile and debasing—fosters vice and crime—and, as has been horribly evidenced by late events, never to be forgotten, indirectly urges on to the most deliberate and cold-blooded murder.

Is this a state of things that can be any longer left safely to find its own remedy? Is not the time arrived when the legislature is peremptorily required to abate the growing evil? Will they who recoil with such horror from all idea of human dissection, suggest any means by which such evils can be averted, save that of superseding exhumation by some less exceptionable provision? Will they persist in wasting all their sensibility on the unconscious dead, and spare none for the injuries inflicted on the living, which their prejudices tend to increase and perpetuate?

I cannot doubt, but that when this subject comes to be considered in all its bearings, and when sound judgment is suffered to moderate those feelings which partial views excite, the good sense which distinguishes the great body of the people will triumph over an inordinate and sickly sensibility, and readily acquiesce in whatever enactments the wisdom of parliament may devise for the public good. What these enactments should be, it becomes not me to dictate. They will be such, I doubt not, as sound judgment and right feeling can approve. If the principles by which the ultimate decision ought to be guided, be allowed their just influence, the measures resulting cannot be far from the right. Those principles may now be briefly summed up in the following position: *The supply of human bodies for the purposes of anatomy should be commensurate with the necessity that demands it; and obtained in whatever way shall least outrage private or public feeling.*

The result of mature consideration devoted to this subject for many years has satisfied me that the only mode of supply capable of fulfilling both conditions, is the appropriation to the purposes of anatomy of the *unclaimed* bodies of those who die in public asylums; and to this, if rightly viewed, it is difficult to conceive how a single plausible objection can be opposed.

Let it not be said that this proposition deals hardly by the poor; or that it makes an invidious distinction between them and the rich. Such an assertion would be untrue; for poverty is not the contingent by which the fitness of the appropriation is here determined. It is the *unclaimed* bodies alone that are contemplated; and of these the very abandonment proves that there are no relations or friends to care what becomes of their remains, or to suffer pain from any use that can be made of them. To appropriate such bodies to the purposes of anatomy (and unhappily they would amply supply its utmost wants) would wound no private feeling, nor be liable to a single objection of the slightest weight, when compared with the vast public good which the culture of anatomy confers. For every conceivable feeling I would make full allowance. However destitute the individual or solitary in the world, his own repugnance, if declared, should shield him from an appropriation of his body from which he revolted, and the anticipation of which caused pain. But when all reasonable provisions were thus made, and the extent to which it is proposed to carry them might satisfy the most fastidious, then might the unclaimed bodies be freely used for anatomical purposes, without the violation of any feeling that could merit a moment's regard. For that mawkish sensibility which attributes to the poor an intensity of feelings and of mental sufferings which has no existence, save in the romantic and extravagant notions of those who imagine it; which exaggerates the imputed horrors of dissection, and declaims on the supposed repugnance to undergo it, as if this repugnance were as great and universal as it suits the declaimer to represent it; which lavishes on the senseless remains of the poor, a sympathy that would be better, and with more real benevolence, directed to relieving the wretchedness which while in life they endure: for this sensibility, I must own, I entertain no respect; and in yielding to it, the legislature would appear to me to stultify themselves, to abandon their duty, to depreciate the national intellect which they are presumed to represent, and to forfeit the confidence which their constituents repose in their wisdom and energy. That such will be the result, I have myself no apprehension; for as I

fully rely on the wisdom of parliament for scrutinizing thoroughly this anxious and difficult question, I equally confide in their decision and firmness for carrying into effect whatever their sense of public duty shall enjoin.

I might here dismiss the subject, but that some incidental matters require to be noticed, which, after the foregoing discussion, may be speedily disposed of.

It has been imagined that the bodies of murderers already consigned by law to dissection might suffice to supply the anatomical schools. This crude supposition has been amply disproved. Even as a partial source of supply, it is so objectionable, that I trust the law which commands it will, ere long, be erased from our statutes. This law, by annexing dissection as a legal penalty, as one inflicted for the purpose of aggravating even the extreme punishment of death, associates it inseparably with a crime of the deepest dye, thus perverting the natural feelings respecting anatomy which a sounder policy would nurture; enhancing the horror with which dissection is too generally regarded, fostering prejudices, and creating additional obstacles to obstruct those other modes by which alone a competent supply of human bodies can ever be obtained. The evidences already before parliament appear to me quite conclusive on both points.

Again, it has been tauntingly urged upon the advocates of anatomy to consign their own bodies to dissection, and thus prove their zeal, public spirit, and disinterestedness. I blush to say that this disingenuous and silly call has been answered; and that in one part of the kingdom, several have been misled into executing a solemn declaration to this effect. Against the folly, absurdity, and utter inconsiderateness of this measure, I loudly protest; for while it evinces abundant zeal on the part of these devisors, it betrays a lamentable want of clear intelligence, sound judgment, and right feeling.

Supposing the parties free to make such a bequest, and that it implied a sacrifice for the public good, as the very taunt which provoked it intimates, by what rule of justice or equity should medical men be called on exclusively to make such a sacrifice? Is the benefit of anatomy confined to them? Are they not on the contrary far less interested in its improvement than are the commu-

nity at large? Are not, in fact, the present race of medical men (if selfishness were to sway them) interested rather in impeding and abridging anatomical knowledge, as its restriction could not but render that which they possess, and of which they cannot be deprived, of tenfold value?

But I contend that they have no right thus to dispose of their remains; for they are not the only parties in whom an equitable interest is vested. Indeed they are the parties least interested; and nothing but unreflecting zeal, unchecked by right feeling or sound discretion, could have betrayed them into swallowing the bait which their opponents so insidiously threw out to them. Had they reflected but for a moment, they could not have overlooked that this apparent magnanimity was in reality the veriest selfishness exercised in utter disregard of the feelings of all those with whom the ties of kindred connected them—feelings which they at least were not at liberty to outrage. For myself I will say, that while I would freely yield my own body for any purpose that could extend its utility beyond the pale of this life, without deeming it the slightest sacrifice, I would shrink from inflicting such pain on all those who are dear to me, as must result from such an appropriation as that in question.—But little need be urged in confutation of this silly and objectionable proposition. It will suffice to test it by the rule already deduced and laid down as that which ought to govern all procedures on this subject. Would the bodies of medical men furnish a competent supply for the medical schools? Would this supply be attended with the least possible outrage of private or public feeling? I shall not insult the understandings of those I address by a formal reply to either question.

Much might be added to what the foregoing observations contain; but for all that might be adduced, a volume would not suffice. My object is not to exhaust the subject, nor even to supply the information necessary for thoroughly comprehending it. This information parliament have ample means of eliciting, and they will not fail, I trust, in calling it forth. Of the real state of feeling amongst the poor as regards dissection, they have much to learn; the repugnance being insignificant compared with the allegations which so boldly

misrepresent it. That some exists is not denied; but it would be slight and easily controllable, if not aroused and exasperated by that false humanity which excites and perpetuates it. The superintendants of our public hospitals know well the truth of what is here alleged. Even from our military hospitals some knowledge might be gleaned; for in these all who die are examined after death, a report of the causes of death, founded on actual inspection of the internal derangements, being required by the Army Medical Board: and I am assured by a medical man who passed many years in the service, that were a military surgeon to neglect this examination, he would be deemed by the soldiers as failing in his duty, and would speedily lose their confidence and respect, under the suspicion that the case had not been properly treated; a fact which shews that partial dissection at least may be so familiarised to men's minds, as to be divested of all its supposed horrors, and rendered accordant with their natural feelings when these receive a right direction. On all such points the legislature will of course take due care to be fully informed. All that it becomes me to attempt in this brief appeal is, to present the general argument in such form as shall best guide each individual member of the senate in pursuing his own inquiries; and preparing his mind for that decision on which he may afterwards repose with confidence and self-approval.

In conclusion, I beg to state, that in the business of anatomical instruction I have no personal interest. Though occupied constantly and extensively in relieving the miseries, and ministering to the wants of the living poor, their dead bodies could to me be no source of personal advantage. The interests which I advocate, are neither those of the anatomical teacher, nor of the medical profession—but of the human race; and if I rightly appreciate the wisdom and benevolence of parliament, they will not in the present instance be misconceived or disregarded.

If the foregoing pages incite to reflection and inquiry those to whom they are addressed, the purpose for which they were written will be served. For any attention with which they may be honoured they must be indebted to their own merits alone. Truth and reason need no adventitious support; and for

the want of these qualities no authority could compensate. This brief essay, therefore, is submitted to you, respectfully, but without a name—the writer being averse to obtruding himself personally on your notice, and wishing on the present occasion to be known only as—

A FRIEND OF SCIENCE AND OF MAN.

THE MEDICAL PROFESSION.

To the Editor of the London Medical Gazette.

SIR,

“THE lawyer is judged by the virtue of his pleading, and not by the issue of the cause; the master of a ship, &c. &c.; but the physician, and perhaps the politician, have no particular acts demonstrative of their ability, but are judged most by the event, which is ever but as it is taken; for who can tell, if a patient die or recover, or if a state be preserved or ruined, whether it be by art or accident? and therefore many times the impostor is prized, and the man of virtue taxed; nay, we see the weakness and credulity of men is such as they will often prefer a mountebank before a learned physician, for in all times, in the opinion of the multitude, old women and impostors have had a competition with physicians. And what followeth? even this—that physicians say to themselves, as Solomon expresses it upon a higher occasion, “If it befall me as befall to fools, why should I labour to be more wise?”—“Therefore (says Bacon), I cannot much blame physicians that they use commonly to intend some other art or practice, which they fancy more than their profession; for you shall have of them antiquarians, poets, humanists, statesmen, merchants, divines, and in every of these better seen than in their profession, and no doubt upon this ground, that they find their mediocrity or excellence in their art maketh no difference in profit and reputation towards their fortune.”

This unpalatable truth is unfortunately as much the opprobrium of our profession at the present day, as it was in the days of that looker “quite through the deeds of men,” in whose words it is quoted, and my attention was more immediately called to it by an account in

the 20th number of Brewster's Journal of Science, in which, out of 381 assembled at "the great congress of philosophers at Berlin," 175 were physicians! So far from this circumstance being in itself a source of regret, it ought to be one of sincere rejoicing to us; but unfortunately it will be found upon inquiry that a very large majority of these 175 are men who, having met with "witches, old women, and impostors," for competitors, have said, "why should we labour to be more wise?" and therefore "intend some other art, which they fancy more than their profession."

My memory will not enable me to go back to past times, and recapitulate the names of those physicians who are known only out of the profession, or the courtier-like qualities of those who have been remembered in it,—and to attempt this of my brethren of the present day would be a most invidious task. I do not, however, think that we abound with the *professional* writings of Linnæus or Galvani; nor that, although learning and science will always delight to honour them, our *medical* posterity will be much benefited by the labours of Wollaston or Young. This is not because they were men of exclusive talent, or because their own profession could not afford "ample scope and verge enough" for their powers, had it held out encouragement to them: their names are a sufficient refutation of the former accusation, and the avidity and true gusto which we have all felt in the study of it, falsify the latter. As long as the medical profession can boast of a Boerhaave, a Hunter, and a Baillie, it will have to take shame to itself that the numbers of those whom it has fostered and kept within its bosom are so small, compared with those to whom it has been at best but an indifferent stepmother,—if it has not entirely alienated them. That our profession is of itself sufficient to occupy an enlarged mind, is proved by the great talents of at least two of the illustrious men last quoted having been entirely absorbed by it; and although, from its intimate connexion with almost all other branches of science, it is more likely than any other to endue its members with scientific tastes and inclinations, yet the *auri sacra fames*, and in most cases the positive necessity of providing for our daily wants, would be more than sufficient to make the pursuit of them secondary;—

and while it sounds loudly and widely the individual praise of its members, that they supplied only the other day 175 out of 381 learned and scientific men, it at the same time proclaims as plainly and intelligibly the disgrace of a profession which allows so many to become illustrious "as antiquarians, poets, humanists," &c. and no doubt upon this ground, "that they find their mediocrity or excellence in their art maketh no difference in profit and reputation towards their fortune." But how, it will be said, is the evil to be remedied, and if it be any thing more than an imaginary one, why has it been suffered to exist so long? As to the first and most momentous point, viz. what is to be done? "not this, by no means, that they bid you do;"—not to throw open the portals of the profession, as Mr. Gingle does his booth at St. Bartholomew fair, and perch a clown on the outside to say, "Walk in, gentlemen, and take any seats you please; pit, boxes, or gallery—all alike;" but to give them a fair, liberal, becoming expansion, so as to admit all of gentlemanly connexions, habits, and education, and thorough professional acquirements, and no others; to wage a *bellum internecinum* against the St. Longs, *et hoc genus omne*; to be very shy of the whole race of book-makers, travel-mongers, monster-hunters, and men with half the letters of the alphabet at their heels; to give "the cold shoulder" to courtiers and sycophants; to recommend some honest mode of gaining a livelihood to

"The apron men, and those who stood so much
Upon the voice of occupation, and
The breath of garlick eaters;"

and to encourage in every possible way independent, upright conduct, gentlemanlike accomplishments, and real talent. I am speaking now of that branch of the profession to which physicians exclusively belong, and in proof that as a body they have much in their power, refer them to what is effected in the law. How few men have ever arrived at eminence or fortune in that profession who were nothing more than pretenders and charlatans; and how large, very large, is the number of those in ours who have acquired both wealth and fame with no other merit. This, I am aware, is partly to be attributed to the public, but it is principally the sin of ourselves. We have the prerogative

as a body of in a great measure assaying and putting the stamp of value upon each individual member, and we have the power, if we would but exercise it, of rendering that value in a great measure current. MEDICUS.

ANALYSES OF BRITISH MEDICAL JOURNALS.

MIDLAND MEDICAL AND SURGICAL REPORTER.

No. V. August 1829.

THE first paper in the present Number contains a minute description of the Worcester General Infirmary, a subject not of sufficient interest for us to enter upon.

On Ulceration of the Intestines. By JAMES M'CABE, M.D. Cheltenham.

This is a singular specimen of medical writing. It begins with a long quotation from Celsus; goes on to speak of dissection as practised among the ancients; thence descends to modern Athens, and the deeds of Burke and Hare. After this preamble, we at length come to the assertion that "of all the diseased appearances which post mortem examinations present to the eye of the pathologist, ulceration of the intestines, or, at least, an increased vascularity of their coats, is by far the most frequent. Let the disease be what it may which produced the fatal termination of a case, we generally find what are considered morbid appearances among the intestines." Notwithstanding this statement, in which the frequency of disease in the bowels is so prodigiously overrated, the author goes on to argue in favour of the *probability* of ulceration of the bowels occurring in a disease in which we imagined every one, with any pretensions to an acquaintance with morbid anatomy, had been aware of its very frequently taking place. The author alludes to "a well-marked case of pulmonary consumption," in which there was colliquative diarrhœa, accompanied, during the last few days, with a discharge of pure blood from the intestines. "I only notice the case (says he) to shew that post-mortem examination would probably have disclosed ulceration among the intestines." We next have a case of dys-

sentery, in which there was "extensive ulceration" of the bowels! We are then presented with some objections to Dr. Baron's pathological views, and some remarks on blood-letting. Next in the order of succession comes a slap at the doctrines of Broussais and at French practice; and, finally, we have some speculations with regard to the cause of those venous congestions which occur after death.

The object of the paper appears to be to shew that a mere acquaintance with morbid anatomy is not alone sufficient to guide our practice; an object which has no reference to the title of the article, and which the author has done little towards accomplishing.

The next article is a continuation of Dr. Walker's "*Observations on English Hospitals*," in which the author proceeds in his elaborate statements with regard to the dimensions, funds, number of patients, and other particulars of the Hospitals and Infirmarys in the provincial towns of England. It is a paper fit only for reference, not analysis; and certainly not calculated for general perusal.

Observations on the Use of the Stethoscope in Affections of the Lungs, &c. By CHARLES HASTINGS, M.D.

This is a very interesting paper, in which it appears to us that a just estimate of the value of the stethoscope is formed, while it contains many valuable pathological and practical remarks. We shall therefore give it entire, without the risk of lessening its perspicuity by condensation.

"Save me from my friends," is an adage which frequent experience confirms. In medicine, more especially, we have numberless opportunities of evincing its truth; for no sooner is any new mode of treatment, or means of investigating disease, submitted to public consideration, than its indiscreet advocates keep within no ordinary bounds of commendation of its value. Thus it often occurs, that when more deliberate cultivators of the science put the improvement to the test of experience, they are disappointed in its success, and consign it to unmerited oblivion.

It is my opinion, that something of this kind has happened with respect to the new method of diagnosis of diseases

of the chest. I cannot even exempt Laennec, the illustrious discoverer of the stethoscope, from the imputation of attaching too much importance to the information to be derived from this source. He obviously inclines to rest his dependence on the results to be derived from the use of auscultation and percussion, to the exclusion of the important aid to be procured from a diligent study of the symptoms. If such a divorce of these helpmates to each other were ever to happen, the discovery of the stethoscope would become comparatively of no avail, for it is only by a proper consideration of the knowledge to be procured from each of these sources, that a correct judgment can be formed of obscure pulmonary affections.

That I may convince the reader that the strictures above made, regarding the celebrated author in question, are not erroneous, I will submit a few remarks relative to the phenomenon of pectoriloquism, which may justly be considered as amongst the most important circumstances relating to the use of the cylinder in pulmonary affections.

Laennec considered that he had, in pectoriloquism, discovered a true pathognomic sign of phthisis pulmonalis. The only sign to be regarded as certain. There can be no doubt of its being a sign of great importance, for this phenomenon is invariably observed when the excavated end of the instrument is applied over a cavity of the lungs communicating with the trachea by means of a bronchial ramification, and the person to whom it is applied pronounces audibly a given number of syllables. Thus far, then, we may predicate with safety, that where pectoriloquism exists, there is a corresponding cavity in that part of the lungs; and also that pectoriloquism is a pathognomic sign of phthisis, if the existence of an excavation in the lungs is necessarily accompanied by consumption; or if pulmonary consumption can never happen without the occurrence of a tubercular excavation: but I am prepared to argue that excavation of the lungs may exist without the coexistence of phthisis; and also that tubercular phthisis very commonly happens, unattended by any excavation, and consequently that pectoriloquism is not a pathognomic sign of pulmonary consumption.

We may first enquire, does the ex-

istence of a tubercular excavation necessarily imply the coexistence of phthisis? That, in infinitely the greater number of persons thus affected, consumptive symptoms also occur, the history of this disease unfortunately, but too decidedly, testifies. But are there not, I would inquire, individuals in whom the existence of such a cavity is consistent with tolerable health; in whom, by length of time, the excavation is emptied of all tuberculous or purulent matter, and becomes lined with a smooth polished membrane? Such persons regain their flesh, and sometimes enjoy years of health, and consequently cannot be said to be affected with phthisis, although, if we consider pectoriloquism a certain sign of phthisis, they must be considered to be so. Laennec has himself described cases of this kind, and other authors have confirmed his observations. The two following cases have fallen under my notice.

CASE I.

A man of 70 years of age was admitted into the Worcester Infirmary, in September 1813. He was subject to frequent vomiting, which has come on within a few weeks. He had been generally a healthy man, but said, that when a boy, he was nearly dying of consumption.

Various remedies were tried, but without avail. The vomiting continued, and he lost flesh and strength. At the end of six weeks he died.

Examination of the Body.—*Abdomen*: An ulcer of considerable size was found in the pyloric end of the stomach, with much thickening of the coats of the organ. The other abdominal viscera were healthy.

Thorax: There was very general adhesion, evidently of long standing, between the pleura covering the lungs and lining the ribs.

In the lungs there were several hard tuberculous masses, but not of a large size.

In the superior lobe of the right lung, we discovered a cavity large enough to hold a walnut. The membrane lining it was in appearance not unlike pleura. It communicated with the bronchia.

CASE II.

The other case of the same nature occurred in a woman, who reached the age of 60. She had, early in life, been much subject to cough, and always remained susceptible of cold. She died of continued fever.

There was in the left lung, in this instance, a cavity with a smooth polished lining. There were also, interspersed throughout

each of the lungs, a few very hard masses, which had apparently been originally soft tubercles, but they had become so hard as to afford considerable resistance, being something like, although not so hard as, the calcareous deposit we meet with in the cellular tissue of the lungs. The cellular membrane which surrounded these substances was in a sound state.

But in addition to this cause of fallacy, in drawing a conclusion from the phenomenon of pectoriloquism, we are also exposed to a similar one, if we neglect a close attention to the symptoms, in case of dilatation of the bronchia. This occasionally happens, and gives rise to a similar phenomenon, although the pathological state of the lungs is very different from that of tubercles. We are forced, then, to the admission, that the existence of pectoriloquism in any part of the chest, by no means necessarily implies that the subject is affected with phthisis, and we are now also prepared to evince, that tubercular phthisis may be present, and pass on to a fatal issue, without ever being productive of tuberculous excavations of the lungs.

In the first number of this Journal*, I have distinctly shewn that tubercular phthisis may exist without any excavation, and that it may become slowly fatal, although the tubercles never soften, by the gradual encroachment of these foreign bodies on the cellular tissue of the lungs, so as to obstruct the free circulation of blood through the organ, and to cause progressive emaciation and debility. In such cases, consequently, the phenomenon of pectoriloquism can never exist as a sign of phthisis. It is also not very uncommon to meet with instances of consumption, where the disease is of much more rapid course, owing to the conjunction of inflammation of the cellular or bronchial tissue of the organ, with numberless miliary tubercles scattered throughout the lungs, and in some parts coalescing, and forming large tuberculous masses. In such instances, death often seizes its victim ere any excavation has formed, and of course before pectoriloquism can inform us of the tuberculous deposit. But although the cylinder, in such instances, does not offer us what Laennec states to be the certain sign, it is, under such circumstances, often exceedingly

useful in pointing out that much mischief is progressing in the lungs; for the absence of the usual respiratory murmur in certain parts of the lungs, where it ought to exist, may justly lead us to pronounce, after sundry trials of the fact, that there exists some unnatural production in the substance of the lungs. In this way, the attentive auscultator may be enabled to form an opinion of the probable termination of consumption in its more early stages, long before excavations are formed, or the symptoms manifest any severe lesion of this important viscus. That such knowledge is of the first consequence to the practical physician, no sensible man will, I presume, deny. It may, in some cases, by pointing out the necessity of early treatment, enable us to avert the fatal issue of a disease, whose ravages annually sweep off a large portion of the population of Great Britain. I am certainly, from some experience, decidedly of opinion, that if our treatment of tuberculous consumption were more early and assiduously applied, we should not so often have to deplore the inefficiency of our art in this dreadful malady. I am aware that this statement is at variance with the conclusion formed by the enlightened discoverer of the stethoscope, but nevertheless, the observations that I have made do not permit me to fall in with the opinion stated by him.

The following may be quoted, amongst others, as an instance where the early symptoms of consumption were checked, and the progress of the disease arrested by appropriate treatment.

CASE III.

Symptoms of Consumption and Tuberculous Deposition, terminating favourably.

M. G. aged 17, was received into the Worcester Infirmary, under my care, in September 1820. She had for some time been out of health. She was affected with dyspnoea on slight exertion, and had a short dry cough. Her habit of body was spare, the complexion delicate, the eye quick and penetrating; pulse 100, small; tongue clean; bowels regular.

By the stethoscope, the respiratory murmur was found to be puerile over the whole of the right side of the chest. On the left side, in several parts, it was puerile also, but towards the upper part of that side there was a spot more than an inch square, in which no respiratory murmur could be

* Midland Medical and Surgical Reporter, No. I. page 28.

heard. Repeated examination with the cylinder confirmed this result. I accordingly, comparing the information derived from auscultation with the general state of health, concluded that a portion of the lung on that side was rendered impermeable to air, by the deposition of tuberculous matter.

The plan of treatment was in conformity with this view. I ordered a seton over the part. She was bled, and drank large quantities of decoction of sarsaparilla with Brandish's alkali for a considerable time. It gave me much gratification to observe, that the plan succeeded in amending her general health. After remaining in the Infirmary some time, she was discharged in tolerable health; but the respiratory murmur had not then returned in the spot before alluded to. I saw her two years afterwards, looking pretty well, but I had not an opportunity of examining whether there was still an absence of the respiratory murmur in the affected part.

In denying, then, that the stethoscope does, in all cases, afford a certain sign of phthisis, I by no means wish to impress the reader with an idea that it may not, even in such cases, afford him important aid in unravelling the mystery which often hangs over this disease; but I would rather stimulate him to renewed exertions, that the discovery which has hitherto so auspiciously forwarded our acquaintance with the obscure affections we are now discussing, may be improved still farther, and at length lead to results in the highest degree beneficial to the healing art. But as it is very far from being my conviction, that any good can be hoped from overrating the dominion we have gained over disease, or the value of the means by which we investigate its approaches, I shall relate the following cases, in which the cylinder failed to give any accurate ideas of the change of structure that was going on in the lungs. In the first of these, a curious combination of morbid changes had taken place in the lungs; for there existed, at the same time, chronic bronchitis, tubercular depositions to a considerable extent, without any excavation, and emphysema.

CASE IV.

The subject of this curious affection was 66 years of age. He was of a thin spare habit, and had been ill with a cough for several years. He had, in fact, been considered asthmatical for five years before I saw him. During the whole of that period he had rather lost flesh, and in each succeeding winter and spring had suffered a considerable aggrava-

tion of cough, expectoration, and difficulty of breathing. I was first called to see him in March 1827. He then complained of distressing cough, particularly at night, and he could not lie down in bed comfortably, for he no sooner attempted it than he was called up by cough. The expectoration was very various, but for the most part frothy; sometimes the frothy matter was mixed with a small portion of pus-like fluid; sometimes the pus-like matter was in great quantity, and occasionally a tough mucus tinged with blood was, after a severe fit of coughing, expectorated. The cough came on usually in fits, and was deep and sounding. The pulse was 80; tongue loaded; stools unnatural; urine pale and abundant; the breathing was laborious, and the muscles of the chest were called into unnatural action.

By percussion, the chest gave a louder than the natural sound, both on the right and left side. The stethoscope discovered an audible rattle in several parts of the chest. It was a wheezing noise, and did not resemble the mucous rattle of bronchitis; in other parts of the chest, scarcely any rattle or respiratory murmur could be heard. I could not, in any part of the chest, discover pectoriloquism. The result of this examination did not much improve my knowledge of the disease of my patient, and it certainly did not lead me to expect that tuberculous disease had proceeded to any great extent. The result of percussion and auscultation rather favoured the notion of emphysema, but the state of the symptoms was not explained by that view of the case. He lived about a month afterwards, and his death afforded me an opportunity of investigating the condition of the thoracic viscera.

On opening the chest, the lungs appeared larger than usual. On examining them more accurately, the air-vessels under the pleura were found, for the most part, very much enlarged, and this gave the apparent increase of magnitude to the lungs. On pressing the lungs, the displacement of air was heard, not at all like the ordinary pulmonary crepitus. The pleuræ were not adherent. When the lungs were cut, air escaped, and then there came in sight numberless miliary tubercles; embedded in the pulmonary tissue. By extending the examination over each of the lungs, the tuberculous bodies were every where found numerous; but in the superior lobes of each lung, they were particularly so, and in several parts they coalesced. The cellular tissue was rather inflamed and thickened. The mucous membrane of the bronchia was much inflamed and thickened. There was considerable dilatation of the bronchial vessels.

The abdominal viscera were healthy, excepting the liver, in which organ there was a deposition of tuberculous matter.

In this case, the cylinder and percus-

sion failed in giving warning of the existence of a tuberculous degeneration of the structure of the lungs, owing to the very rare conjunction of extensive emphysema of the organ with the miliary tubercle, on which account no sign was afforded by the physical investigation, indicative of the real cause, that was slowly acting so as to destroy life.

The next case to which I shall call attention, is one where a considerable ulceration took place in softened lungs, so as to cause a cavity, which gave rise to the phenomenon of pectoriloquism, whilst, at the same time, there were no tubercles in the organ. The following is the outline of the symptoms:—

CASE V.

On the 19th of August, 1825, I was consulted respecting a young lady, who had been for two months in a dubious state of health, from a very slight cough, with trifling expectoration in the morning, which had once or twice been tinged with blood. On the morning of my visit, she had expectorated some blood, unmingled with pus or mucus, and a scarlet colour. Her parents were on this account under great alarm, as they had previously lost three children in consumption. There was nothing, however, in the general appearance of the young lady to have given alarm to an ordinary spectator. She was rather full of flesh, and considered that she had rather gained than lost in that particular during the last two months. To an experienced eye, however, she had not a healthy look, for the countenance was rather bordering on the cadaverous, and the eyes were dull. The hands felt clammy, and there was unaccountable listlessness in the young lady's manner. The pulse was 76; the tongue was clean, and the bowels were regular. I could not trace any feverish action during the twenty-four hours. The breathing was free, and a full inspiration caused no uneasiness. The catamenia were regular. In short, she declared that, excepting the slight barking cough which attacked her in a morning, when at the toilette, she was in perfect health. She betrayed nevertheless much perturbation at the sight of the expectorated blood, and declared a firm conviction that the disease was similar to that of which her relations had died.

I examined, at this visit, the chest very particularly, and found that percussion produced a natural sound on each side. With the stethoscope, the respiratory murmur was heard natural on the right side, and no indication of any excavation of the organ. On the left side of the chest, however, perfect pectoriloquism was heard on front of the chest, between the second and third, and third and fourth ribs.

Some blood was taken from between the shoulders by the cupping-glasses, and I directed a mixture of infusion of roses and tincture of digitalis, to be taken every four hours. I also advised quietude and a milk diet.

In a few days the spitting of blood disappeared, and this amiable young lady described herself in perfect health again, excepting that she had a slight morning cough, and trifling expectoration. She walked about without any hurry of respiration, and seemed anxious not to be considered an invalid. It was, notwithstanding, but too evident, that the disease was formidable, for another examination with the stethoscope established still more strongly my conviction, that there existed an excavation in the superior lobe of the left lung. The eyes also looked peculiarly languid, and the hands had a deadly clammy feel.

She went on with very little appearance of illness, and without losing any flesh, till the 15th of September, on the morning of which day she coughed up about two teaspoonfuls of dark-coloured blood, accompanied with a small quantity of pus-like matter. The pulse was 94. The breathing was not at all hurried, and there was not any heat of the skin. By appropriate treatment, this bleeding subsided, and did not return till the 28th of the same month, when a sudden exasperation of the symptoms took place. The breathing became hurried; the cough much more troublesome, and a considerable quantity of scarlet coloured blood was expectorated. Various means were ineffectually tried to arrest the progress of the disease. The bleeding repeatedly occurred, and my patient died in the morning of the 8th of October.

Examination of the body.—No considerable emaciation had taken place. On elevating the sternum, nothing worthy of remark presented itself. On removing the lungs, they were found slightly adherent on the right side, but much more so on the left; on both sides the adhesion was high up, and in the direction of the axillæ.

The internal surface of the trachea was free from purulent secretion. The bronchia contained a small quantity of sero-sanguinolent fluid. On tracing the ramifications in the right lobes, the only appearances were a rather suffused state of the blood-vessels in some parts; the lungs of a soft structure, and the air-vessels throughout pervious.

The general appearances of the left lobes resembled those of the right; but on the outer and upper surface of the superior lobe, appeared a cavity large enough to admit the half of a middle sized orange, which had been prevented from opening into the sac of the pleura by the adhesion of the pulmonary to the costal pleura. This cavity communicated freely with the bronchial tubes. Pus was searched for, but the slightest trace of

it could not be found; nor was there the slightest degree of hardness in the sides of this ulcer indicative of the process of adhesive inflammation having been set up. On the contrary, the appearance was that of simple ulcerative absorption rapidly advancing.

The stethoscope here, although it forwarded my knowledge of the case, by showing that a cavity was formed in the left lung, gave no real insight into its nature. Agreeably to Laennec's rule, that pectoriloquism is a certain sign of tuberculous phthisis, I concluded that my patient was so affected. Proceeding on this assumption, and being convinced that the mischief was confined to the superior lobe of the left lung, I came to the conclusion, that it was not impossible, as there was an absence of emaciation, and the symptoms were not at all urgent, that it might turn out to be one of those cases in which, from the quiet state of the symptoms, the lining of the cavity eventually becomes polished; but at any rate I could not regard it as a case in which the disease would make a rapid progress. How vain, however, did my speculations prove! owing to the disorganization being of an entirely different nature to that which Laennec supposes the stethoscope discloses with certainty.

If the stethoscope had been, in this case, the true sign of tubercular phthisis, confined, as the diseased action was, to a part of the superior lobe of the lung, recovery might have been possible; and the fatal event would, at any rate, have been for some time deferred; but the cavity being occasioned by the generally softened state of the lungs predisposing to ulcerative absorption, and the ulcerative action being progressive, and not followed by any adhesive process, a number of blood-vessels were opened, which accounted for the occurrence of the repeated, and at length fatal, hemorrhage.

The stethoscope, then, is not a certain test of tubercular consumption, as Laennec supposes it to be. Should we, then, cease to employ it as a means which may materially aid our attempts to develop the morbid changes that occur in the organs contained within the cavity of the thorax? Undoubtedly not. For there is scarcely an affection of any one of those organs which may not be, in some degree, made clear, by studying the physical signs that are af-

fected by auscultation and percussion. The object, therefore, of the preceding observations, is not to disparage the discovery, but chiefly to shew that our dependence must not be too confidently placed in these signs, to the exclusion of a diligent study of the natural symptoms.

To relinquish the use of auscultation and percussion because we have not hitherto, by their means, unravelled all the intricacies, and escaped all the difficulties, which beset us in investigating the obscure class of affections that we have been considering, would ill accord with that modest and patient research which should ever distinguish the philosophical inquirer, and should more especially belong to the votaries of a science, where so much is yet to be accomplished, and where every fact correctly ascertained and well applied to its elucidation, has a tendency to alleviate human suffering, by increasing our power over disease.

[To be continued.]

EXTRACTS FROM JOURNALS, *Foreign and Domestic.*

ON THE RESPIRATION OF BIRDS.

By Messrs. W. Allen and W. K. Pepys, FF. R.S.

THE inquiries of the authors on human respiration, and on that of the guinea-pig, of which they communicated the details to the Royal Society in former papers, are here extended to the respiration of birds. Pigeons were the subjects of these experiments, and the same apparatus was employed as the one used for the guinea-pig, described in the Philosophical Transactions for 1809. The object of the first experiment was to ascertain the changes which take place in atmospheric air when breathed by a bird in the most natural manner. For this purpose a pigeon was placed in a glass vessel, containing about 62 cubic inches of air, and communicating with two gasometers, one of which supplied, from time to time, fresh quantities of air, and the other received portions which became vitiated by respiration. The experiment lasted 69 minutes, and was productive of no injury to the bird, except a slight appearance of uneasiness whenever the supply of air was not sufficiently rapid. On examining the air at the end of the experiment, no altera-

tion had taken place either in the total volume of air, or the proportion of azote which it contained; the only perceptible change being the substitution of a certain quantity of carbonic acid for an equal volume of oxygen gas, amounting to about half a cubic inch per minute, and being equivalent to the addition of 96 grains of carbon in 24 hours.

Two experiments were made in the respiration of oxygen gas, obtained from chlorate of potash, and containing in the one case two, and in the other only one, per cent. of azote. Under these circumstances, it was found that the volume of the gas was unaltered, and that a similar quantity of oxygen gas had been abstracted, but that a much smaller quantity of carbonic acid had been formed than in the last experiment; the remaining portion being made up by azotic gas, which had been given out from the lungs of the bird, and the volume of which was first equal to that of the oxygen absorbed. The bird was somewhat disturbed during the experiment, but recovered immediately and perfectly on being released from its confinement. In the fourth experiment, in which a pigeon was made to respire a mixture of oxygen and hydrogen, with a small proportion of azote, (the oxygen being in the same proportion as in common air,) it was found that there was no loss of oxygen, but that a quantity of hydrogen disappeared, and was replaced by an equal volume of azote. The authors observe that birds have a quicker circulation of blood than other animals; and also that they are more sensible to the stimulating effects of oxygen.—*Philosophical Magazine*.

STINGING OF A GNAT.

On the 25th October last, about two o'clock in the day, a gnat alighted on my forefinger. I held my hand still, and observed it. It immediately applied its proboscis to the skin, at the same time moving its antennæ and hind legs slowly up and down, which it continued to do for a few seconds, when it became apparently motionless, resting on its four front legs, with its hind ones stretched out in a line with its abdomen. I now felt a slight sensation where the proboscis was inserted, but so faint that, had not my attention been directed to it, I probably should not have noticed it; and this I only felt for a second or two. The abdomen

now began to swell gradually, the influx of the blood being clearly visible through its semi-transparent skin: at the same time a clear watery fluid began to ooze from the anus, forming a round globule. It had a curious appearance to see blood flowing in at one end and water out at the other. The drop fell, and another formed, the abdomen all the time getting larger and larger, and redder and redder, until the second drop fell. The abdomen had now attained full three times its natural size, with a deep blood-red hue, when, to my great vexation, the door opened, and away flew my little toper, without appearing the least encumbered with its bloody cargo. I must further observe, the insect was altogether about one minute on my finger; that no part of the outer sheath of its proboscis was inserted beneath the skin; that I did not receive any warning of its intentions. There was not the slightest pain, inflammation, or mark of any kind left, that was perceptible.—*Mag. of Nat. Hist.*

EFFECT OF CHLORINE AS AN ANTIDOTE TO HYDROCYANIC ACID.

The following is abstracted from a letter by M. Dauvergne to M. Gay Lussac, describing an experiment made by himself and M. Siméon. Two drops of hydrocyanic acid were put into the end of a glass tube, and introduced into the lachrymal gland of a cat: contractions immediately came on, followed by strong tetanic convulsions; an abundant salivation took place, producing, through hard breathing, a thick white froth. The pulsations of the heart were quick, irregular, and extensive, as if each was the last effort of life. Inspiration was difficult and painful; expiration, frequent, prompt, and forcible. Notwithstanding this desperate state of the animal, M. Siméon was induced, from his previous knowledge, to expect good effects from the use of chlorine, and therefore introduced a considerable quantity into the mouth: the salivation in consequence ceased; the respiration became easy; the circulation less forced and rapid. The animal now raised its head, which before it could not do; put out its tongue, and scented the chlorine as if it took pleasure in respiring a salutary and agreeable atmosphere. In this manner the symptoms gradually diminished, but as yet

the cat could not stand up. Being exposed to the open air for a few minutes, it voided a large quantity of fæces, gradually rose on its feet, and made a few tottering steps: this was in one hour after the poisoning. At the end of two hours, traces of the event were scarcely visible; and the next morning the cat ate, drank, and walked, as if in perfect health,—no signs of the effect of the previous day remaining. *Ann. de Chimie.*

VORACIOUS APPETITE—ABSENCE OF THE GALL-BLADDER.

M. de L—, of large stature and robust constitution, had always been remarkable for his great appetite. He was above 60 years of age when he was consulted by Dr. Gaultier, by whom his case is related. At this time he was very fat, had much colour, although his skin generally had rather a yellow tinge; his belly was very prominent. In the morning he could scarcely wait till nine o'clock for his breakfast; he dined at two, and took a hearty supper in the evening. His habits may, in one sense, be said to have been austere, for although he eat enormously, yet he did not indulge in sensuality. Immediately after eating he became heavy, his face of a deep red, his head dropt upon his bosom, he fell fast asleep, and continued in this state for about an hour, after which he was always impatient for the next meal. He lived a very regular life, and walked about two hours a day. Latterly he complained of pains in the right hypochondrium, and the corresponding side of the chest and shoulder; his complexion had become more yellow than usual, his physical strength diminished, and his gait was slow; he was also exposed to moral influences of a depressing nature. The practitioners whom he consulted suspected some disease of the liver, in consequence of which he was sent several successive seasons to Vichy. At length symptoms of pulmonary consumption supervened, under which he gradually sunk. The body was examined by M. Gaultier. There was considerable emaciation compared to the former *embonpoint*, nevertheless half an inch of fat remained over the chest and abdomen. There were two rather large, and several small collections of purulent matter under the integuments about the right side of the chest; and a fistulous opening at the verge of the anus, com-

municating with a considerable abscess in the vicinity of the rectum. There were several collections of matter in the lungs, none of which communicated with the bronchi. The stomach was immensely large, the muscular coat being very strongly developed. The intestines were very voluminous, especially the large, but contained very little feculent matter. The liver was large, but not out of proportion to the stature of the individual; and its structure was healthy. Notwithstanding the most minute examination, *no trace of a gall-bladder could be discovered, nor any thing which indicated the former existence of that viscus.* The duodenum adhered directly to the liver by very short and dense cellular texture. A biliary calculus was found in the intestine, opposite the situation where in the natural condition the opening of the ductus choledochus exists; but which, in this instance, only led to a very short canal, (two lines and a half in extent), which distributed itself immediately in the liver, without any of its branches running in the direction usually assumed by the ductus cysticus. The spleen was of the ordinary size, but extremely soft.

The narrator of the case asks, whether it be probable that the great appetite, and rapid digestion in this case, were owing to the bile being constantly transmitted to the duodenum, keeping it in a constant state of excitement, and thus sympathetically influencing the stomach. He also remarks that there are cases on record in which the ductus choledochus has entered directly into the stomach; and that in these also the appetite was voracious.—*Journal Hebdomadaire.*

HOSPITAL REPORTS.

LA CHARITÉ.

Lithotomy — Extraction of nearly a Hundred Calculi—Unusual situation of the Prostate.

A MAN, aged 70, had suffered for four years in passing his urine; several times he voided gravel, particularly during the past year. He was sounded by M. Roux, who easily discovered that the sensation communicated by the instrument

was not that of a large stone. The clashing of the sound and of the stones against each other shewed their multiplicity. M. Roux generally uses the cutting gorget, but on this occasion employed the *lithotome caché*. When he wished to introduce the forceps, it was observed that he was obliged, in order to make them enter the bladder, to depress them considerably, so as to give the grasping extremity a direction obliquely from below upward, and from behind forward. Numerous small stones were extracted, and the instrument required to be introduced seven or eight times. At length a great quantity was extracted, nearly a hundred in number, of various sizes, the largest scarcely equal in dimensions to the point of the finger. Although the patient was but moderately fat, the finger of the operator could not reach the cavity of the bladder. M. Roux attributed this circumstance either to the prostate being smaller than ordinary, or to its being nearer the symphysis pubis, which would render the neck of the bladder more elevated than natural. The operator was not satisfied that after all there might not be some calculi left in the folds of the bladder, notwithstanding that numerous injections were had recourse to. The external layer of the calculi was composed of oxalate of lime, the interior of uric acid.

Next day the patient was doing well.

M. Roux, on a former occasion, many years ago, successfully removed 193 calculi, at one operation, from a patient on whom M. Boyer had operated ten years before, and extracted a great number of stones.—*Lancette Française*.

HOTEL DIEU.

Extirpation of the entire Uterus, by M. Recamier.

JULY 24th.—Agatha Bienaimé, aged 50, of placid disposition, nervous temperament, and moderate *embonpoint*. She became a mother at the age of twenty-one, had another child at twenty-nine, and a third at thirty-five. She menstruated at twelve and a half, and continued to do so in a natural manner till her fortieth year. At this time the function became deranged, and during nine years presented various anomalies more or less alarming. At her forty-ninth year, the premonitory symptoms

of organic disease of the uterus manifested themselves. Discharges, sometimes sero-mucous and sometimes sanguinolent, occurred at irregular intervals. Sexual intercourse gave great pain, and was frequently followed by hæmorrhage. By degrees, the discharge became changed in character, and had a sour smell, *sui generis*. Her strength and appetite declined, but no local pain as yet indicated the seat of the affection. The urine was clear, and passed without uneasiness; but the alvine evacuations had, for three months, been rather hard, and had excited some pain. For a few days before her admission, the utero-vaginal discharge had become more abundant and horribly foetid.

On examination, the bladder and rectum were found healthy; but a hard, irregular, voluminous tumor was felt in the region of the womb. The neck of the uterus was softened, and the examination of this part always caused a slight hæmorrhage. M. Recamier being satisfied that an operation presented the only chance of safety, proceeded to perform it, July 26th. The patient was placed in the posture adopted in lithotomy. MM. Marjolin, Breschet, and others, satisfied themselves that the part of the rectum corresponding to the disease was free and untouched. The operator, without the aid of a speculum, laid hold of the anterior part of the neck of the uterus with a pincers (*pince de Museux*), and by means of gentle pulling brought it down to the centre of the vulva; another pincers was employed to seize the anterior lip, and the two instruments were then confided to assistants. A transverse incision was next made, at the anterior part of the parietes of the vagina, three lines from their junction with the neck of the uterus; the fingers of the operator being introduced into the space which separates the uterus from the bladder, so as to lift up the reflection of the peritoneum passing between these two viscera. The fore-finger was then employed to strip off, or perhaps tear this membrane, till it arrived at the free edge of the broad ligament, which was seized and dragged down, while another finger, introduced into the rectum, assisted in the descent of the uterus. A curved needle, armed with a strong ligature, was then introduced through the broad ligament, so as to include its inferior half. The same

manœuvre was next practised on the other side; and the threads given in charge to assistants. The round ligaments and the uterine arteries were thus comprehended in the ligatures. It was M. Recamier's intention to have divided the back part of the vagina from below upwards, but the tumor leaving little space for this proceeding, the following was adopted. After having cut the broad ligaments beneath the ligatures, and divided the portion of the peritoneum which was too adherent to be pulled off, he carried the hand to the summit of the uterus, which he reversed forwards, and then, slipping the blade of the knife between the rectum and upper part of the vagina, dissecting by short saving movements the portions of this canal, any morbid alteration of which he could detect by the touch or with the speculum. This section being completed, the entire uterus passed from the pelvis of the patient into the hands of M. Recamier.

Contrary to the natural disposition of the parts, they presented a triangle, the apex of which was turned upwards, the basis being embraced by the vagina. This lower part was completely scirrhus, and the part of the vagina next to it softened so much as to inspire apprehensions in the mind of M. Recamier, who proposes to cut out any vestige of cancer which may remain with a curved scissars. Scarcely had the extraction been completed when the epiploon appeared at the gap: it was pushed back, and retained in its place. The blood flowed rather freely, but was arrested by tying the ligatures above mentioned. The pain is said not to have exceeded that of an ordinary labour; and the operation, performed with the utmost coolness, lasted only twenty minutes. The instrument used was a convex blunt-pointed bistoury.

The third day after the operation, the patient was going on well.—*Ibid.*

GUY'S HOSPITAL.

New mode of restoring the Lower Lip, after its removal for Carcinoma.*

JOHN MAC GORARAN, aged 70 or 75, states, that between four and five years ago, in consequence, he believes, of the irritation produced by his pipe, a small and hard pimple

reaching from the gum nearly to the apex appeared on his lower lip; that it soon became an ulcer, hard, foul, and obstinate, refusing to heal under any application; and that, to the present time, it has steadily and constantly been enlarging. He has had various surgical advice, and, of course, tried a multitude of remedies; among others, decoction of hemlock was used for twelve months, but nothing produced the least improvement in the appearance of the diseased part.

On admission (July 1st), he presented a very miserable appearance. The lower lip was entirely destroyed, there being in its place a mass of cancerous disease of the chin, and, on each side, extending into the cheek, a little beyond the angle of the mouth; on the left side also, attacking the upper lip, of which more than an inch is involved. The diseased surface has the appearance of carcinomatous ulceration; it is foul, irregular, indurated with everted edges; a sanious discharge, and acute lancinating pains. In consequence of the loss of the lip, speech is rendered very imperfect; the mouth cannot be closed, and the salivary secretion continually flows over the sore down to below the chin. The absorbent glands are not enlarged; the patient's constitution seems very little affected by the disease; there is scarcely any irritation, although he has not, he says, had a good night's rest during the last two or three years. For his age, he is robust and healthy. Pulse 60; functions natural.

July 14th.—The disease has visibly extended during the last fortnight; the ratio of its growth is daily more and more rapid; so that, unless removed, it must soon destroy the patient, and that by a most miserable death. This being the case, and the man himself, though told that an operation might prove fatal, desiring it, Mr. Morgan determined to operate.

The first step of the operation, which consisted in the removal of the mass of disease, was little more than a work of free dissection: a semi-elliptical incision was carried below the disease, from a point rather beyond the right angle of the mouth, across the chin, and upwards on the left side through the cheek, and then inwards, so as to terminate in the upper lip, including its diseased portion. The two extremities of this external incision were then connected by one carried within the mouth, through the gum, close to the sockets of the teeth. These incisions served to isolate the disease, and it only remained to separate it from the jaw by careful dissection. Considering the extent of divided surface, the bleeding was moderate; six ligatures were applied to the facial artery and its branches.

The second part of the operation consisted

* Connected with this subject, see some cases in our last Number treated at the Edinburgh Infirmary, and one at page 349 of the present Number, treated at Winchester.

in filling up the chasm produced by the removal of so large a part of the face, and especially in supplying a new lip. This Mr. M. at first meant to have accomplished by *reflecting* a portion of integument upwards from below, leaving it attached at *one point**; but he afterwards preferred the following more novel and effective method. Recollecting the lower line of incision (crossing the chin) made in the removal of the disease, the reader must conceive another incision nearly parallel to it, but about two inches lower, carried across the throat, completely from side to side, in a direction somewhat semilunar; the portion of integument between these incisions being by them detached above and below, but retaining its connexion at the sides, was to form the new lip. Mr. Morgan, by careful dissection, separated its under (or inner) surface from its connexion with the deeper parts, so that it formed a loose isthmus, or bridge of skin, attached only at its ends; he then drew it over the jaw, up to the mouth, so that its upper margin corresponded with the natural situation of the lower lip; and when fixed by sutures to the upper lip, three at the left angle of the mouth and two at the right, a very well formed mouth was produced. It was supposed that the surface left on the throat, by the removal of its integument, must be left to fill up by granulation; but when the mouth was formed, Mr. Morgan found that he was able, by depressing the chin upon the chest, to approximate closely the edges of the wound; this was done, and five sutures applied, so that, although so much integument was lost, and more changed in situation, every part was eventually put into a condition of possibly healing by adhesion. In addition to the sutures, strips of adhesive plaister were freely applied, so as almost to encase the face, and prevent any separation of the parts.

July 15th.—The patient is extremely comfortable; has no irritation; no fever; pulse 64, soft. The new lip retains complete vitality, its warmth and circulation continue, and there is promise of considerable adhesion.

17th.—Going on as favourably as possible.

18th.—The lower incision has throughout united by adhesion, and the same union has in part taken place at the angles of the mouth, between the new lip and the upper one; but a part, especially at the right side, is granulating, with which Mr. M. is not displeased, as he thinks the mouth will be moulded into a better form than if all was done by the adhesive process.

20th.—The parts have been a little disturbed by the patient in his restlessness re-

moving the dressings, so that the lip appeared fallen from the jaw; but on re-applying the dressings it was restored to its place.

22d.—The lip remains very well supported; there is not now any tendency to fall. On shaving him to-day, it was curious to observe, that, *when the razor was applied to his lip, he referred the sensation to the throat, whence it was taken.* No sutures now remain.

August 3d.—The case may now be considered as complete, and is certainly a very beautiful specimen of what it is in the power of surgery to accomplish. The contrast between the patient's present and former appearance is very striking, and there is not, at any point of the healing surface, the least sign of carcinomatous action. The result fully justifies Mr. Morgan in performing an operation which was discountenanced by all his surgical friends, as in their view hopeless, if not rash.

We learn that an operation somewhat resembling the above, but differing in detail, was recently performed by Lisfranc; but he lost his patient. M.

WINCHESTER COUNTY HOSPITAL.

Case of an unusually enlarged Adipose Tumor —*Extirpation.*

[In our last Number we gave some interesting cases of tumors removed from various parts of the body, furnished us by our correspondent at Glasgow. We now add to the list the following account from our respected contemporary, the Provincial Medical Gazette. The case was treated by Mr. Lyford.]

Abraham Pierce, æt. 60, labourer, admitted for the purpose of submitting to the removal of a large tumor, depending from the upper, central, and anterior part of the left thigh, and of which he gave the following account. When thirty-two years of age, he fortuitously discovered a small swelling, about the size of a nut, situated on the interior part of the abdomen, midway between the superior spinous process of the ilium and pubis; it was unattended with pain, and perfectly detached from the contiguous parts, being extremely moveable in all directions. After the expiration of four years from the period at which his attention was first directed to it, it had very sensibly enlarged, but retained its original situation. With its augmentation in bulk, however, it gradually descended from the abdomen to the thigh, and there had been permitted unmolestedly to attain its present magnitude. At the time of his admission, it was of an oblong pyramidal shape, and somewhat resembled, in its configuration, an inverted

* The usual Taliocotian operation.

oil-flask, suspended by a long and narrow pedicle from the thigh, and falling pendulous between the knees. The following were its admeasurements:

Circumference of the tumor measured twenty-one inches.

Circumference of the pedicle, three inches.

Circumference of the pedicle before its expansion into the tumor, four inches and three-quarters.

Length of the pedicle, four inches.

Length of the tumor, eighteen inches.

It had, at no period from its commencement, produced uneasiness, except from the inconvenience of its size and weight, which the patient had endeavoured to counteract by the employment of a suspensory bandage, from the friction of which, the skin, at the lower part of the swelling, had become much inflamed, accompanied with a small slough, which was extremely offensive. On manipulating it, that inelastic softness, so peculiar to adipose tumors, was instantly detected. Notwithstanding the extraordinary size and growth of the swelling, he had not, at any time, shewn it to any professional person, and had studiously endeavoured to conceal his deformity. The operation for its removal consisted in placing the patient in the recumbent posture on his back, and drawing the tumor towards the right side, so as to place the integuments of the cervex of the tumor on the stretch, which were then incised transversely, and the whole dissected away with the greatest facility, and without hæmorrhagy; one moderate sized artery alone having been distributed to it. The lips of the wound were then adjusted, and retained by the application of two sutures and the adhesive plaster: no particularly unpleasant symptom supervened, but the wound did not unite by adhesion. In a few days granulations appeared, which were somewhat indolent, but assumed a very healthy appearance on the exhibition of the decoction of bark, with a generous diet. The ligature from the artery came away on the tenth day. A section of the tumor having been made after its removal, presented an entire mass of fatty matter, intersected by unusually firm and compact bands of cellular membrane.

Cancer of the under Lip removed by simple Incision, as a substitute for the Hare-lip Operation.

[In our last number will be found an account of two operations for new lip, from our Edinburgh correspondent. An interesting description of an operation for a similar purpose, by Mr. Morgan, is inserted in the present number. The following case, from the same source as the preceding, also deserves attention, as connected with this subject.]

Thomas Jolland, æt. 62, a healthy muscu-

lar man, received, whilst engaged in the act of felling a tree, a trifling incised wound on the centre of the villous surface of the under lip, which, however, became extremely troublesome, from the difficulty experienced in obtaining a perfect and satisfactory union. The wound healed but for a short period, when the lip began to be affected with occasional lancinating pain throughout its whole upper surface, which, at length, gradually enlarged, and then indurated. In this state it remained, more or less stationary, for two years, when a slight crack or fissure, through the mesial line of the lip, occurred, discharging a scanty and thin ichor. The surface of the fissure soon became obscured by a brown scab, and, from beneath it, a commixture of blood and pus exuded. With the increase of the disease, there was no aggravation of pain, or any appearance of its extension into any of the neighbouring glands, which had not at any period become sympathetically enlarged or tender. The remaining cuticle of the upper surface of the lip, having become abraded, was soon invested, likewise, by a furfuraceous scab, which occasionally exfoliated, exposing to view an extensive, though superficial, ulceration, evidently cancerous in its nature. The patient having consented to the extirpation of the diseased parts, their removal was effected in the subjoined mode.

Operation.—The patient being seated on a chair, as usual, and the external maxillary arteries being compressed by the assistant at the same time that he supported the head, a crescent-shaped incision, commencing from the left commissure of the mouth, extending to the exact situation on the opposite side, was effected by one stroke of the scalpel; the breadth of the lip removed varying from one quarter to half an inch, and including, of course, all its villous surface between the commissures, which were retained.

No suture or ligature was applied; the bleeding being easily suppressed by the application of lint; the adhesive plaster and the double-headed bandage passing over the vertex and occiput. The dressings were removed, for the first time, on the fourth day. The surface of the wound appeared healthy, and covered with a layer of adhesive matter. From this time suppuration commenced, and continued until the incision had completely healed.

The wound had been daily dressed merely with dry lint—the granulations have been healthy and very luxuriant—and the cicatrization appeared to emanate and to be continued over the outer surface exclusively, from the cutis lining the internal part of the lip. Since the operation, there has been no difficulty in retaining the saliva, nor has the patient been debarred from his usual diet, which he was enabled to masticate with his

usual facility, neither has the freedom of articulation been interrupted.

Previous to his discharge—weeks after the operation—the lip had acquired a natural appearance, in respect to elevation, plumpness, and colour. He was requested to return to the hospital in the course of a few weeks, in order to afford an opportunity of seeing if any, and what, alteration had taken place.

The simplicity of the operation; the very limited space of time occupied in its performance; the trifling inconvenience sustained after its accomplishment; are decidedly advantages of no ordinary description, but such as we venture to predict will ensure its general employment; and thereby supersede, in the majority of instances, the operation which has hitherto been exclusively performed in cases of cancer of the lip.

EDINBURGH ROYAL INFIRMARY.

Amputation—Secondary Hæmorrhage—Ligature on Femoral Artery, &c.

CASE I.—Peter M'Neil, æt. 15, admitted under the care of Mr. Liston, on the 8th of May.

About a year ago he sustained a contusion of the right foot; it became much swollen, and about a fortnight after the receipt of the injury an abscess formed immediately over the cuboid bone. An opening was made into the abscess, which has continued to discharge slightly. By the introduction of the probe, the cuboid bone is found denuded of its periosteum, and in a carious state.

May 11th.—Yesterday two issues were applied over the tarsus. They were formed by rubbing muriate of mercury into scarifications made by the lancet. To-day the integuments surrounding the eschars are considerably inflamed, with an increase of the swelling of the foot and ankle.

The separation of the sloughs was followed by considerable purulent discharge. On examination by the probe, the cuneiform bones were ascertained to be ulcerated and much softened in texture. The patient's health was visibly declining.

June 3d.—To-day amputation was performed at the middle of the leg. The operator standing on the inside of the limb, and holding the ankle with his left hand, made an incision about three inches in length, from below upwards, along the outside of the fibula, and continuing the incision across the fore part of the leg, transfixing the limb from within outwards. The point of the knife was made to protrude through the upper part of the incision on the outside of the leg; on which, the knife was carried downwards, and the posterior flap formed. The hæmorrhage was commanded by the assistant compressing with his hand the popliteal

artery. The common dissecting forceps was used in securing the arteries; one end of each ligature was cut close to the vessel, and the flap retained by stitches.

Mr. Liston stated, that, by performing amputation of the right foot in the above manner, the surgeon is enabled to support the limb by the left hand whilst using the saw, and avoids the risk of passing the knife between the bones in performing transfixion.

On laying open the foot the intertarsal ligaments were found irregularly thickened and ulcerated. In many places the cartilages of the tarsal bones were partially absorbed. The ulcerated surfaces of the cuboid and cuneiform bones were surrounded by spongy granulations.

June 7th.—To-day the stump was dressed, and the flap appears to have united. Patient continues well.

June 8th.—This morning there was a smart hæmorrhage from the stump. It was restrained by the application of gentle pressure.

June 9th.—Hæmorrhage recurred early this morning, and again returned to an alarming extent at 2 P.M., when the femoral artery was secured by ligature as it passes under the sartorius.

June 10th.—The face of the stump looks rather sloughy. Skin hot; tongue clean; pulse 100.

June 13th.—A small slough separated from the stump.

June 17th.—The wound in the thigh is nearly united. There is considerable discharge of healthy pus from the stump. The patient was ordered wine and steak.

June 20th.—The stump is dressed daily and the limb is supported by the roller. The patient's health continues good.

June 25th.—All the ligatures have been removed from the stump. The ligature on the femoral artery has also separated.

July 6th.—The stump has almost entirely cicatrized, and the patient is able to walk on crutches.

CASE II.—David M'Gregor, æt. 54. Admitted under the care of Dr. Campbell on 18th May.

Has sustained fracture of lower third of fibula, with compound dislocation of ankle-joint. Over the malleolus internus there is a wound, two inches and a half in length, through which about an inch of the lower end of the tibia protruded. The internal lateral ligament was ruptured, and the cavity of the joint completely exposed. He states, that he was knocked down in the street. It is supposed he was then intoxicated, as he is unable to give a distinct account of how the accident happened. There had been a good deal of hæmorrhage from the wound previous to admission. He is of an irritable habit of body, and has been much addicted to dram-drinking.

The dislocation was reduced, the edges of the wound were brought together by sutures, and the limb was placed in M'Intyre's splint.

May 19th.—He was ordered a cathartic draught, and low diet.

May 20th.—There is considerable pain and tension of ankle. \mathfrak{Z} xvi. of blood were taken from the arm.

May 21st.—Has slept well after the exhibition of an opiate. Complains less of pain in the leg. Bowels open; tongue clean; pulse 100, and soft. Venesection was repeated to \mathfrak{Z} viii. and 24 leeches were applied to the leg. A draught of tr. opii, with antimonial wine, was administered.

May 24th.—The pain and swelling are much diminished. Some vesications have formed over the outer malleolus. Considerable discharge of purulent matter, mixed with synovia, from the wound. Tongue white; severe hiccup; nights restless; pulse 92. The lower part of the leg has assumed a dusky red colour.

May 25th.—The swelling continues less, but he complains of more pain in the leg; the redness is extending upwards, and the integuments over the outer ankle are of a gangrenous appearance. Hiccup more severe; tongue foul; pulse 80.

R Tr. Opii, gtt. 50. Hab. Mist. Salinæ, \mathfrak{Z} j. c. Aq. Cinnamomi, \mathfrak{Z} i. quaque tertia hora.

June 3d.—Ankle less painful; tongue clean; pulse stronger.

June 5th.—A small opening has formed over the outer malleolus, discharging pus. He was ordered wine and nourishing food.

June 12th.—Last night the pain of the ankle increased, attended with rigors, nausea, and slight vomiting. Has slept none; pulse 100, and weak; tongue foul. On the introduction of the probe, the anterior part of the lower end of the tibia feels rough, and the cartilages of the joint appear to be partially absorbed. There is much discharge from the wound.

June 14th.—The probe, introduced into the opening over the outer malleolus, passes readily behind the joint, and protrudes through the wound on the inner side.

June 17th.—Great emaciation. Discharge from the ankle copious and gleety.

Habeat Vini Rubri, \mathfrak{Z} xvi., et Alcohol Diluti, \mathfrak{Z} viii.

June 18th.—Rigors, followed by profuse perspiration. Face flushed; sleep disturbed; pulse 116.

June 20th.—Yesterday the leg was amputated immediately below the knee. Transfixion was performed from without inwards. Since the operation he has had \mathfrak{Z} vi. of brandy and \mathfrak{Z} j. of tr. opii. Pulse 120 and weak; tongue furred; profuse perspiration

during the night, and an attack of rigors this morning.

June 21st.—Pulse 104; no rigors, or vomiting. Has had \mathfrak{Z} viii. of brandy.

June 22d.—Violent hæmorrhage recurred from the stump at eight this morning. The femoral artery was secured by ligature in the usual manner. Pulse frequent, weak, and irregular. Subsultus tendinum. Slight incoherency. Some vomiting. Powerful stimulants have been administered.

June 23d.—The patient sunk at 2 A.M.

On examining the stump it was discovered that the ligature had separated, by sloughing, from off the popliteal artery.

Lithotomy.

John Cuddy, æt. 26, admitted under the care of Mr. Liston, May 13th. For several years he has laboured under the usual symptoms of stone in the bladder. A calculus is distinctly felt by the introduction of the sound. He is subject to severe asthmatic paroxysms.

May 31st.—The lateral operation of lithotomy was performed by Mr. Liston, and three large stones, each of the form of an irregular tetrahedron, were readily extracted. The operation, though somewhat delayed by the struggles of the patient, in consequence of the occurrence of an asthmatic paroxysm, was completed within three minutes. A gum elastic tube was introduced through the wound into the bladder, and retained by tapes.

June 2d.—Since the operation the urine has passed copiously through the tube, which was to-day withdrawn.

June 17th.—Yesterday a catheter was introduced, since which the greater part of the urine passes per urethram.

June 26th.—The callous edges of the wound are touched with blue stone.

July 7th.—The whole urine passes through the urethra, which has been dilated by the introduction of metallic bougies.

July 9th.—Dismissed cured.

DEVON AND EXETER HOSPITAL.

Ligature on the Aorta.

WE understand that the operation of applying a ligature on the aorta has been very recently performed at the Exeter Hospital, by that able and intelligent surgeon, Mr. James, for an aneurism of the external iliac artery, situated very high up. A ligature was, in the first instance, placed on the distal side of the aneurismal sac, on the femoral artery; which measure having failed to produce the desired effect, and symptoms of the most urgent description having supervened, the aorta was secured after the manner adopted by Sir A. Cooper. The patient survived the operation but a very few hours.—*Prov. Med. Gazette.*

CHERMSIDE v. GALIGNANI.

A most unfounded and scandalous charge was some time ago brought against certain English physicians resident in Paris, of receiving a per centage on their prescriptions. Several trials took place, which ultimately terminated in favour of the physicians, and the affair was pretty well settled, when a repetition of the charge, probably forwarded by some of the disappointed parties, appeared in that magazine of slander, "The Morning Journal." The article was copied by Messrs. Galignani, who had been formerly implicated in the business, into their "London and Paris Observer." On this Dr. Chermside brought an action against these persons, and we are glad to see that he has succeeded in obtaining redress.

"The following judgment," says the *Courier de Tribunaux*, "was delivered by the President of the Civil Tribunal of the Fourth Chamber of Justice, in Paris, in an action of libel, tried by that court on the 6th instant, on the suit of Dr. Chermside, an English physician established in Paris, against Galignani brothers, as defendants:—

'The publication in question appeared first in the Morning Journal, and was copied from that paper into the London and Paris Observer, edited by Messrs. Galignani.

'Considering that the brothers Galignani have published in their journal, entitled the "London and Paris Observer," an article calculated to affect the honour and reputation of Dr. Chermside;—

'That the letters C——de, &c. contained in the article, sufficiently indicate the person against whom it was directed;—

'That the excuse pleaded by Galignani of having copied the article in question from an English journal, cannot be admitted in his justification:—

'Considering likewise, in the estimate of damages, that regard should be paid to the respective situation of the two parties; that Dr. Chermside has instituted this suit more from the desire to obtain public reparation for an injury done to him than from motives of pecuniary interest; and that, on the other side, the brothers Galignani offered to Dr. Chermside to publish any such apology as might meet his wishes;—

'The tribunal condemns the brothers Galignani in the payment of 500 francs damages, with costs, including the expense of the translation of the article on which the action was brought.'

DR. GORDON SMITH AND HIS
"HINTS."

IN our Number of the 25th of July, we inserted a notice declining to publish an anonymous letter, which we had received, pointing out some "typographical errors

in the London Encyclopædia, and certain blunders in Dr. Gordon Smith's Hints for the Examination of Medical Witnesses." In consequence of this, we have received a letter from the individual above-mentioned, in which he calls our conduct "*novel, base, and unmanly*;" asserts that the notice is "*a mere fabrication*," and that "*it will be difficult for any superficial and ridiculous—any affected and unmannerly quidnunc, to dissatisfy him with his publication*;" he then "*dares and defies*" us "*to do our worst*," and subscribes himself, "*with great contempt*," JOHN GORDON SMITH.

That the worthy Professor was partial to his own productions, we did not require this repeated assurance to convince us; as, in the little work alluded to, he has, with singular *naïveté*, referred his readers for farther information to his own more voluminous writings, which, he says, "*have been stated by good judges to be the best British authority*." So little disposed, indeed, is our irascible friend to be "dissatisfied" with his performance, that he ventures to say we have received no such communication as the one alluded to: but in this he is mistaken, and indeed the construction of our notice bears internal evidence of its truth; nay, even the Doctor himself might have been convinced that *we* should never have thought for a moment of associating so important a work as the London Encyclopædia with one so insignificant as his two-and-sixpenny duodecimo. We did not think his work worth an analysis, and we see no reason to change our opinion. As, however, he "*dares and defies*" us, we may just hint, that, before he again addresses the "Bench, the bar, and the legal profession," he had as well make himself acquainted with the law on the subjects of which he treats. He will find, for instance, that his statements with regard to what is required to constitute legal evidence of certain crimes, contained in the articles beginning at pp. 79, 83, are wholly incorrect, and the reasoning thereupon stultified by enactments of which he is evidently ignorant, (9 Geo. IV. c. 31, xviii.) This was pointed out by our correspondent in a manner more disrespectful to the author than our notice, for he actually took the liberty of laughing at the idea of the learned Professor tripping on ground which he seems to have persuaded himself is exclusively his own. As to the contempt which the worthy doctor has for us, we must bear it as well as we may; the readiness with which we have published his opinion will best shew the importance we attach to it.

BOOK RECEIVED FOR REVIEW.

An Introduction to Systematical and Physiological Botany. Illustrated with Explanatory Engravings. By Thomas Castle, F. L. S. Lond. 1829. pp. 285.

W. WILSON, Printer, 57, Skinner-Street, London.

THE
LONDON MEDICAL GAZETTE,

BEING A

WEEKLY JOURNAL

OF

Medicine and the Collateral Sciences.

SATURDAY, AUGUST 22, 1829.

ON THE DIAGNOSIS

OF

ANEURISMS OF THE AORTA,

BY

GENERAL AND STETHOSCOPIC SIGNS.

To the Editor of the London Medical Gazette.

SIR,

IF you think the subjoined Memoir worthy of a place in your journal, you will oblige me by its insertion.

It consists principally of cases which came under my observation during a residence of two years as House-Physician, and afterwards Surgeon to the Royal Infirmary of Edinburgh. A number of these, with observations and generalizations, constituting the substance of the present essay, were printed for private circulation in 1825. Since that period about twenty additional cases have presented themselves to my notice, and in every instance submitted to the scalpel, I have found the diagnosis verified by the post-mortem appearances. It is, therefore, perhaps, not premature to submit an outline of the subject to the profession; and I offer it merely as an imperfect sketch, the fidelity of which is to be ascertained, and the deficiencies supplied, by future investigations.

I have the honour to be, Sir,
Yours faithfully,
J. HOPE, M.D.

13, Lower Seymour-Street, Portman-Square,
August 7th, 1829.

On the Forms and Situations of Aneurisms of the Aorta.

Without entering into a description of the causes and anatomical characters

of aneurisms, it is sufficient for my present purpose to state generally, that the aorta is obnoxious to *simple dilatation* and to *sacculated aneurism*; and that, by the former I mean diffuse and equable enlargement of the whole calibre of the artery; and by the latter, a sac or pouch of any dimensions, rising at an angle more or less acute from a circumscribed and often a very limited portion of the vessel.

Dilatation, though the most ordinary disease of the aorta, rarely proceeds to such an extent as to be productive of serious consequences. For, as the interior of the vessel presents little impediment to the transmission of the blood, the circulation is accomplished with sufficient facility; and, as the tumor is moderate, its increment gradual, and its form equable, the contiguous parts easily accommodate themselves to its presence, and no individual organ suffers from exclusive pressure. But it rarely happens that dilatation of the aorta is not, sooner or later, complicated with organic disease of the heart. Whether the latter affection be a mechanical consequence of the former, or whether it be merely an offspring of the same predisposition which generated the dilatation, it is unnecessary, and perhaps impossible, to determine; but the disease of the aorta generally precedes the other, and when once the heart has become implicated, the case instantly assumes a formidable aspect, and the patient speedily sinks under the twofold malady.

The ascending portion and the arch, particularly the latter, are the ordinary seats of dilatation; but the descending thoracic and abdominal aorta is sometimes enlarged into one, or even a series, of ovoid or fusiform tumors. The whole

length of the vessel is occasionally dilated to double its natural dimensions—an alteration which most commonly displays itself in the aged. I have met with one instance of this kind presenting the additional peculiarity, that the artery was converted by ossification into a rigid tube; and this state existed not only in the aorta, but also in the great arterial trunks down to the ankle*.

Sacculated Aneurisms are, in a large majority of cases, seated in the arch of the aorta; and in this situation they are sometimes so voluminous as to exceed the magnitude of the foetal head.

Aneurismal affections of the descending aorta are of comparatively rare occurrence. In the subjects which I have examined, the proportion has not exceeded one in twenty. It is important to retain this infrequency in recollection, as it will facilitate the diagnosis of those pulsating tumors in the abdomen which formerly were often mistaken for aneurisms, even by the most sagacious and experienced practitioners.

Effects on the Contiguous Parts.

The mechanical effects of aortic aneurisms vary according to the volume, the form, and the position of the tumor.

Simple dilatation, when not enormous, is productive of little inconvenience; but an aneurism which forms a defined tumor, even though its magnitude be inconsiderable, may exert such pressure on the adjoining organs as to entail the most disastrous consequences.

When it encroaches on the lungs, the patient complains of a sense of constriction and weight oppressing the chest and exciting dyspnœa, with short, dry cough. When it compresses the trachea or large bronchial divisions, he experiences a distressing sensation of the trachea being violently dragged downward; the respiration is wheezing and sibilous; the voice is either croaking or reduced to a whisper, and dyspnœa, often supervening in spontaneous paroxysms, is more agonizing in this than I have observed it to be in any other affection of the respiratory organs.

When the œsophagus is compressed by the tumor, deglutition of solids is rendered difficult and sometimes totally impracticable; for the descent of the morsel excites an excruciating pain from

the summit of the sternum to the spine, or lancinating deeply in every direction through the chest.

When the heart is exposed to the pressure, and when, as sometimes happens, it is displaced downwards, or in any other direction, according to the volume and position of the tumor, the consequences are palpitation, dyspnœa, and the most distressing anxiety.

Although the derangements hitherto specified are only functional, yet when they exist in an eminent degree they are sooner or later destructive of life. In the abdomen, on the contrary, the functional derangements are usually so inconsiderable as not to menace the existence of the patient. The reason of this is two-fold—first, the abdominal organs are not of so vital a nature as the thoracic; secondly, the tumor, instead of being confined in an unyielding case like the chest, is permitted by the distensible parietes and soft viscera of the abdomen to expand almost indefinitely. Thus, by the want of resistance, pressure is obviated, and for this reason caries of the vertebra and ribs are incomparably more rare in this cavity than in the chest.

Ventral aneurism, however, sometimes deranges the respiration, in consequence of the descent of the diaphragm being impeded either by the proximity or the magnitude of the tumor. It is also occasionally characterized by involuntary evacuation of the urine and fæces, by remarkable alternations of constipations and diarrhœa, and by deep-seated excruciating pains, resembling those of lumbar abscess, though there be no erosion of the spine.

The absorption of contiguous parts, occasioned by the pressure of the tumor, produces far more terrific consequences than those proceeding from functional derangement. In many instances instant death is the result. When the lungs, for instance, are in contact with the tumor, adhesion takes place between the sac and the pleura, the pressure occasions absorption, the septum is destroyed, and the effused blood deluges the bronchi, and causes immediate suffocation. When the trachea, œsophagus, or great bronchial trunks are exposed, division of the sac takes place by the same process, and death is an immediate consequence of the hæmorrhage.

The bursting of an aneurism into the

* The patient died of dry gangrene in the Hotel Dieu, Paris, 1826.

pericardium is a rare occurrence, though Morgagni*, Walter, and Scarpa, have recorded a number of instances. When this happens, the patient either expires instantly, as is usually the case, or if the tumor is very voluminous, life may be prolonged for a few hours, and even days; for some maintain that the infarction of the thorax occasioned by the magnitude of the aneurism, supports the pericardium in such a manner as to oppose the influx of blood, and thus prevent the heart from being immediately inundated and oppressed.

M. Laennec has recorded a case in which the aperture from the aneurism into the pericardium exhibited a smooth polished surface, like that of an old fistulous canal†.

Most aneurisms of the arch, and nearly all those of the descending thoracic aorta, which burst internally, discharge their contents into the left cavity of the pleura. Rupture seldom occurs into the right pleura, and still more rarely into the pulmonary artery; instances of both, however, are on record‡. Professor Monro, tertius, showed me a preparation in his private museum, of an aneurismal pouch springing from the aorta, directly against the pulmonary artery; and it is probable that, if the life of the patient had been prolonged, rupture into the artery would have ensued. M. Laennec once saw an instance of an aneurism bursting into the thoracic duct, and inundating all the lacteals with blood§. M. Corvisart saw the superior vena so compressed by an aneurism that the reflux of the blood was prevented, and fatal apoplexy was the consequence.

Of all the tissues, the osseous is the most susceptible of absorption from the pressure of aneurisms. The dorsal vertebræ, along which the tumor is frequently extended, are sometimes so deeply eroded as to expose the spinal marrow; for an adhesion being formed between the sac and the spine, the interposed soft parts are absorbed, and the denuded bone being thus exposed to the torrent of the blood, its destruction is effected partly by the increased action of its absorbents, and partly, per-

haps, by mechanical detrition of its osseous particles. But the inter-vertebral cartilages being sparingly provided with absorbents, and protected from mechanical disintegration by their remarkable elasticity, are most commonly found singularly exempt from injury. Aneurisms of the ascending aorta and summit of the arch are less apt to occasion erosion of the vertebræ than those of the posterior extremity of the arch and of the descending aorta, for these parts are in apposition with the spine. The symptoms, therefore, of erosion of the spine contribute to indicate the situation of the tumor. The two or three superior dorsal vertebræ, not being in contact with the aorta, are rarely injured. The abdominal vertebræ are, as already described, greatly protected by the yielding of the parietes and viscera.

The sternum and ribs are equally liable to absorption as the spine, and when their destruction has been completed, the tumor presents externally, immediately beneath the integuments: the skin there becomes livid and progressively thinner, the apex gradually points and acquires a more intense discoloration, a slough ensues, and its detachment is instantly followed by fatal hæmorrhage.

Aneurisms of small volume have a greater faculty of destroying the bones than those of considerable magnitude; for the latter are usually lined with strata of organised lymph and coagulated blood, by which their sacs are strengthened and their dilatibility diminished; the blood, at the same time, from the great capacity of the tumor, and from the aperture being more or less obstructed by lymph, enters with so little expansive force as sometimes not even to develop a pulsation of the tumor; by the co-operation, therefore, of these two circumstances, viz. the strengthening of the sac and the diminished power of the blood, the tendency of the aneurism to amplify itself is suspended, and the pressure on the adjacent parts becomes so inconsiderable as no longer to excite the absorbents to morbid activity.

Symptoms.—Aneurisms of the aorta, when buried deep in the chest, and not manifesting themselves externally, present no peculiar and pathognomonic signs of their existence. There are cases in which they occasion no functional disturbance, no inconvenience

* Epist. xxvi. 20. 7. 21. Epist. xxvii. No. 28.

† De l'Auscultation, tom. ii. p. 428.

‡ Bulletin de la Faculté de Médecine, 1819, No. 3. Vid. Trans. of a Society for the improvement of Med. Chirurg. Knowledge, vol. iii. p. 85, case by Dr. Wells.

§ Journal de Médecine, par MM. Corvisart, Leroux, et Boyer, tom. 12, p. 159.

whatever; and the fearful truth is not unveiled until the patient, apparently in the enjoyment of perfect health, suddenly falls an inanimate corpse. I have encountered several cases in which large aneurisms existed without awakening even a suspicion. One, in particular, eluded the remarkable diagnostic perspicacity of M. Chomel, although, in his exploration of the lungs, he employed auscultation with eminent success.

A large class of symptoms manifested by aneurisms of the aorta, are identical with those common to all organic diseases of the heart—viz. dyspnœa, palpitation, cough, tendency to syncope, frightful dreams, starting from sleep, hæmoptysis, discoloured complexion, dropsy, &c. It is foreign to my object to dwell on these, as they will be sufficiently exemplified in the subjoined cases: but there are certain other signs, which, as they are considered more distinctive and characteristic, require particular consideration; yet even these are fallacious and unsatisfactory, since they only bespeak lesions of the viscera, or derangement of their functions, but do not proclaim the latent cause of the mischief. I shall succinctly enumerate these signs, and subjoin to each the principal source of fallacy. The method of obviating the latter I reserve for the sequel.

1. When the tumor has attained some degree of magnitude, the cavity of the chest is preternaturally crowded, and the patient complains of a sense of constriction, infarction, and oppression.

But these sensations are common to almost all diseases of the chest.

2. The radical pulses are not alike, because the origin of the arteria innominata, or left subclavian, when involved in the disease, is either contracted, or obstructed by a coagulum of blood, as in Cases 7 and 8.

But difference of the two pulses at the wrist may proceed from a variety of incidental causes; as contraction of the origin of either subclavian from osseous, cartilaginous, steatomatous, or other deposition, independent of enlargement of the aorta; obstructions in the course of the artery, occasioned by tumors, wounds, subclavian aneurisms, &c.; irregular subdivisions of the humeral, or brachial, or radial artery. I have known the most ludicrous surmises to be occasioned by the radial crossing to the outside at the middle of the fore-

arm, and the superficialis volæ supplying its place at the wrist. Finally, difference of the two pulses may be a nervous affection, and each may alternately predominate in strength over the other.

3. When the origin of either subclavian is contracted, the pulse at the corresponding wrist is a little later than the ventricular systole.

I have not found this symptom uniformly present. It did not exist in Cases 7 and 8. The heart is more frequently its source than the aorta, and I have found it most considerable in cases of regurgitation into the left auricle; but obstruction of the aortic valves may occasion it in a minor degree, particularly if that lesion be accompanied with extenuation or atony of the ventricular parietes. When the sign is developed in both pulses, the presumption is strong that its source is in the heart.

4. A purring tremor* is sometimes perceptible on applying the hand to the superior part of the sternum.

Purring tremor above the clavicles is an almost constant concomitant, and therefore a valuable sign of dilatation of the arch; but, according to my own experience, it is unfrequently and imperfectly developed by sacculated aneurisms†. Whether proceeding from the one cause or the other, I have found that it is confined exclusively to the super-clavicular and super-sternal regions, unless the tumor has eroded the parietes of the thorax and presented externally, in which case the tremor is, *cæteris paribus*, as perceptible through the integuments here as above the clavicles.

But purring tremor may be occasioned in any part of the chest by mucous rattles, particularly of the snoring kind, in the large bronchial tubes; and I have observed that when derived from this source it is a very common cause of fallacy, in reference both to aneurisms of the aorta and ossifications of the heart. Purring tremor of the pulse is regarded as a sign, though it is a fallacious one, of ossification of the aortic valves. From many dissections it has appeared to me to be generally connected with two circumstances—viz. a powerful action of the heart‡, and ruggedness without ap-

* The frémissement cataire of M. Laennec.

† Vide Case 5, and observations; also Cases 7 and 8.

‡ It, therefore, seldom exists, except when the circulation is accelerated.

preciable obstruction of the aortic orifice, or interior of the arch.

5. When the trachea, or primary bronchial divisions, are compressed by an aneurismal tumor, a harsh wheezing, or sibilous sound, proceeding deep from the throat, characterizes the respiration; the voice is either croaking or reduced to a whisper, or it is a compound of both; the breathing is excessively laborious, and, in extreme cases, spontaneous paroxysms of dyspnœa are of more frequent occurrence, and terrify the patient with more agonizing apprehensions of instant suffocation than, perhaps, in any other complaint of the respiratory or circulating apparatus. When the œsophagus is compressed, dysphagia results, as in Case 8. It is principally aneurisms of the arch which occasion it, because this portion of the vessel bestrides the gullet; whereas compression of the trachea is usually due to enlargements of the ascending aorta, because this part crosses the bifurcation.

But compression of the trachea or œsophagus may be occasioned by tumors of any description. Wheezing respiration may proceed from an accumulation of glutinous mucus in the great bronchi. I have likewise seen it produced in an extreme degree by thickening of the arytenoid cartilages, and also by ossification and scrofulous ulceration of the larynx. Many instances have occurred in which it has been erroneously imputed to an affection of the larynx when it was really occasioned by aneurism of the aorta; and with the view of obviating suffocation, bronchotomy has several times been actually performed.

6. When the vertebræ are eroded, the patient suffers an intense terebrating pain in the spine; and when the brachial plexus of nerves is compressed by the tumor, an aching sensation pervades the left shoulder, neck, scapula, and arm, with numbness, formication, and impaired motive power of the limb. (Vid. Cases 6 and 8).

But in Case 7 nearly similar pains were experienced, although there was no destruction of the vertebræ; and it is quite common to hear individuals affected with rheumatism or spinal disease make the same complaints. A corresponding affection of the arm constitutes one of that concatenation of symptoms which are denominated *angina pectoris*. I have likewise often met with it in hysterical females subject to palpitation,

and occasionally in cases of pericarditis. In these cases it probably originates in irritation of the cardiac plexus of the sympathetic propagated to the brachial plexus.

7. When, in consequence of an adhesion between the aneurismal sac and the pleura, the blood plays upon the lungs, a sense of ebullition is said to be experienced.

But the same symptom is familiar to individuals labouring under phthisis or chronic mucous catarrh; and it proceeds from large bubbles successively formed and ruptured by the transmission of air through the fluid in tuberculous caverns, or in the greater brachial ramifications.

8. It occasionally happens that the patient suffers excruciating pain from a spasm, pursuing the course of the diaphragm, and binding the chest around as with a cord.

This symptom is too vague to be important; and it also occurs in hysteria, gastrodynia, colic, spinal diseases, and diaphragmatic rheumatism.

9. A pulsation felt under the sternum or ribs at the superior part of the chest.

This, although one of the least equivocal signs of aneurism, is not without ambiguity. It may be occasioned by a tumor of any description, as an enlarged gland, or a cancer interposed between the sternum and the aorta, and receiving the pulsation of the latter. Even Dr. Baillie says, "we are not to conclude from this symptom that there is certainly an aneurism. I have felt the same kind of pulsation in other cases; as, for instance, where the pericardium was found strongly to adhere to the heart; where there was a slight inflammation upon the surface of the heart, with a little more water than usual in the pericardium; and where a morbid enlargement had taken place in the heart without any aneurismal swelling." Every one much conversant with disease must have made the same observations.

10. A pulsation is felt above the sternum or clavicles.

But this may be occasioned; 1st, by enlarged glands or other tumors seated on the subclavian artery, and receiving its pulsation; 2d, by varix of the jugular vein at its junction with the subclavian; both of which conditions have deceived expert practitioners; 3d, by subclavian aneurism. The latter affection sometimes resembles

aneurism of the aorta so exactly that it is extremely difficult to distinguish them. Allan Burns records a case in which all the eminent surgeons of the district were unanimous in pronouncing the affection subclavian aneurism, yet it proved to be aortic*. Sir A. Cooper has published a number of similar cases; and one is mentioned by Professor Monro tertius†. 4th. By carotid aneurism‡.

11. A pulsating tumor presents externally through the sternum or ribs.

This sign is conclusive; but unfortunately it is never developed until the disease has made irretrievable progress.

It cannot be a subject of surprise that a series of symptoms, liable to so many fallacies, should hitherto have proved insufficient to redeem aortic aneurisms from the catalogue of obscure diseases.

When, however, these symptoms coincide with the signs afforded by auscultation they lose their ambiguity, and rise into real importance; for the two classes of indications, general and stethoscopic, are a commentary on each other, and they reciprocally borrow a precision and certainty of which they are individually destitute.

Alterius sic
Altera poscit opem res et conjurat amicè.

[To be continued.]

LIGATURE APPLIED TO THE AORTA.

[THE following is an extract of a letter to the Editor from Mr. James, of Exeter, who intends to lay fuller details of the case alluded to before the Medico-Chirurgical Society.]

Exeter, August 15th, 1829.

The patient, a man aged 44, had an aneurism of the external iliac. The situation and size of the tumor seemed to preclude any attempt to tie it above; and I was induced to adopt the plan revived by Mr. Wardrop, of applying a

ligature on the femoral below it. This was done on the 2d of June, and it was at first followed by a very sensible decrease in the tumor; but shortly the ground gained was again lost; and after considerable further enlargement, it became evident that the process of sloughing was about to take place. Under these circumstances the patient's situation was fully and explicitly stated to him; and he, having judged that it was better to take the only chance which remained, than perish by bleeding; his nearest relations also having given their full and deliberate assent, I performed the operation alluded to on the 5th July, nearly in the situation in which it was done by Sir Astley Cooper. Much difficulty was experienced from the great and very embarrassing protrusion of the bowels. The ligature, nevertheless, was applied, but the patient died in the evening, having suffered extreme pain in the aneurismal limb from the time the ligature was drawn.

On examining the body, it was found that the ligature had been applied to the aorta without including or injuring any other part. It was also ascertained that the probable reason of the failure of the first operation arose from a cause that could not have been foreseen; namely, that instead of the usual distribution of the arteries below, the external iliac in this case divided into two nearly equal trunks; and although the artery corresponding to the femoralis superficialis had been correctly tied, the channel through the other remained open. The weight of the tumor was nearly four pounds. I shall only further add, that circumstances prevented me from performing the operation from the side of the abdomen, or from tying the common iliac, which I should have preferred, if practicable.

I have the honour to remain, Sir,
Your most obedient servant,
J. H. JAMES.

TREATMENT OF SCARLATINA.

To the Editor of the London Medical Gazette.

SIR,

IN common, I doubt not, with many of your readers, I perused with much interest Messrs. Taynton and Williams' communication in your number of Sa-

* Surg. Anat. of Head and Neck, p. 30.

† Elements of Anat. Vol. 2, p. 249.

‡ In April 1826, I saw a case at Guy's Hospital, in which there was much deliberation respecting the propriety of taking up the carotid above a pulsating tumor, supposed to be an aneurism of that artery. It was finally decided that the tumor was too low, and the design was judiciously abandoned. The affection was a dilatation of the aorta and arteria innominata. The carotid was sound. This state was indicated by the stethoscope. The preparation is at Guy's Hospital.

turday last, on the efficacy of Belladonna as a preventive against Scarlatina. Allow me, as this disease is under discussion, to request that yourself, or any of your numerous correspondents, will favor us with the result of your experience of the powers of the carbonate of ammonia in its treatment; given, as recommended by Dr. Peart and Mr. Wilkinson, in every form and stage of the complaint; and with the impression that it exercises some specific influence over it and the other exanthemata, independently of its ordinary property of sustaining the vis vitæ. Those who witnessed the ravages of this terrible disease in the neighbourhood of London during the last spring will, I am persuaded, concur in my conviction, that, where it assumes a malignant character, the ordinary antiphlogistic treatment at its commencement, or that by wine, cinchona, and other tonics, are utterly inadequate to control it. This, and the great discrepancy among practical men in their views on this subject, are my excuse for trespassing on your attention.

I am, Sir,

Your most obedient servant,

C. W. CROWDY.

Brixton, Aug. 13, 1829.

ANATOMICAL QUESTION.

[THE following paper, in which the bearings of the anatomical question are placed in a very perspicuous light, was written for the edification of those to whom the discussion is less familiar than it is to medical men, and was circulated in manuscript among some of the leading members of the legislature. We earnestly exhort our brethren in the country to take advantage of this the other documents we have lately published, and to co-operate with us, during the recess, in enlightening the members of both houses upon the subject, in order to prevent the bill which is to be introduced next session from sharing the fate of the last.]

At present the schools of medicine and surgery are supplied with subjects for dissection which are procured by illegal means; and even this supply not only falls far short of what is really required, but is in danger of being much further diminished.

This is a great evil, which should be

remedied if possible, and for the following reasons:

1. The want of anatomical knowledge among medical, but more especially among surgical practitioners, would lead to very serious results. Even the commonest operation in surgery (that of bleeding) could not be performed with safety, far less those which are more difficult or complicated. An old man, with a strangury from an enlarged prostate, whose life is at present scarcely supposed to be in danger, must be left to die. A man with a strangulated rupture would be in the same predicament; and physicians as well as surgeons must be mere empirics, having no principle to direct them either in the diagnosis or the treatment of diseases. It is true that there may be no great danger of the study of anatomy being altogether abolished; and there would be always a supply of practitioners skilled in anatomy sufficient to meet the demand made by the higher classes of society; but the poor, and even the middle classes, would suffer. The life of a labourer, or of a person who keeps a chandler's shop, is as valuable to himself and his family as that of a nobleman, and it will afford very little consolation to his wife to know, when her husband is no more, that, if he had been of higher condition, his life might have been saved.

2. Such is the importance of anatomy, that those who are engaged in the study of medicine and surgery will always endeavour to learn it, as far as it lies in their power to do so; and if subjects for dissection cannot be procured by legal and decent means, they will be procured by means which are indecent and illegal. The present system of procuring them by the robbery of churchyards, is attended with very great mischief in various ways. It disgusts and alarms not only the surviving friends, but the whole of society. Some are rendered miserable because they know that the bodies of their friends have been stolen from the grave, and carried to the dissecting-room, and others because they are apprehensive that the bodies of their friends may be served in the same manner. The men who are employed to exhume bodies are of the very worst description; they are outcasts of society, who, being pointed at as *resurrection men*, are unable to maintain themselves by any honest em-

ployment, and are thus driven to become thieves and house-breakers; because, when not actually employed in stealing bodies, they can do nothing better.

The price of subjects at this moment is as high as eight, ten, or twelve guineas, and it has been as high as fifteen guineas: but many a person has been murdered for a much smaller sum than the least of these. Here, then, is an inducement to commit actual murder; and, in addition to the mere gain, there is this further inducement, namely, that the murder is committed under circumstances peculiarly calculated to effect its concealment, as the bodies in the dissecting-room soon become disfigured, so that they cannot be recognized, and it is not to be supposed that the teachers of anatomy, except under particular circumstances, can distinguish the bodies of those who are murdered from the bodies of those who die a natural death*. This is now proved to be no imaginary evil: but the public need not be surprised that it has occurred. It has been foreseen by medical men whose attention has been directed to these inquiries for some years, and the danger has been pointed out to many members of the legislature; nor can all the activity of the police, nor all the watchfulness of the teachers of anatomy, prevent it recurring some time or another, if there be no casier method of supplying subjects for dissection than that which is now resorted to, and if they continue, in consequence, to produce the enormous sum which they produce at present.

3. One effect of the existing difficulty of procuring subjects in this country, is, that a large proportion of medical students visit the continent, and reside in Paris, or elsewhere, for the purpose of dissection. It may not be very creditable to us, as a nation, that we should not possess among ourselves the means of instruction in so important a branch

of knowledge as anatomy; but there is another and a stronger reason for lamenting this emigration of medical students: there is no class of society in whose honour, and integrity, and good principles, the public are so deeply interested as in those of the medical profession. The members of it are admitted to a degree of confidence which is not given to any other individuals. Circumstances are, of necessity, made known to them which are not intended for the world, and the disclosure of which would, in many instances, destroy the peace of a family. They visit their fellow-creatures labouring under, not only the bodily, but the mental weakness of disease; and a depraved or dishonest person will easily convert these opportunities to some base purpose of self-advancement or self-gratification. We need not insult our neighbours by asserting that there is more vice in Paris than in London: be that as it may, there is still good reason to suppose that a number of young Englishmen are more likely to fall into vicious and dissipated habits in the former city than in the latter. Even if their parents reside in a distant county, they have in all probability relations, and at any rate they have acquaintances in London; and, while in London, they are in constant communication with their families in the country, and they are in a greater or less degree under the *surveillance* of their friends. But while they reside in Paris these restraints are removed: they are left entirely to themselves, and that at a period of life when temptations are new to them; when their passions are strong, and when good counsel and good example are of more importance than at any other period, either earlier or later. Can any one regard this as a favourable condition for young men who, in the subsequent part of life, are to have such trust reposed in them as necessarily must be reposed in medical practitioners?

4. The foregoing considerations relate to the public more than to the members of the medical profession; but surely something is due to the latter. Let us observe what is their situation under present circumstances.

Anatomical knowledge is necessary to a right understanding both of medicine and surgery. But the law declares that the having a dead body in your possession is a misdemeanour; and the

* It may be observed, further, that it is impossible for the teachers to spare from their other occupations the time necessary to make an accurate examination of each individual subject that is brought into the dissecting-room; and that, if such examinations were made, they would have the effect of preventing the students making some of the most important and useful dissections afterwards. The subjects must be handed over to the students untouched; the teachers and senior students may and ought to be as vigilant as possible; but it is equally absurd and unjust to suppose that any absolute responsibility can rest upon them.

judges lay it down as a maxim, that there is only one legal way of possessing a body for dissection, namely, by procuring that of a man hanged for murder. The anatomical students are compelled to deal with people who steal bodies from churchyards, and who are liable to be punished for so doing. But the College of Physicians, the College of Surgeons, and the Company of Apothecaries, all require, that those who present themselves for examination should have attended anatomical lectures, and should have performed dissections. Again: a man dislocated his shoulder. He applied to a surgeon-apothecary, who did not discover the dislocation. Some time afterwards, it was discovered by a surgeon, when it was too late to reduce it. The patient brought an action against the person whom he had first consulted; and the jury, under the direction of the judge, found a verdict for the plaintiff, with one hundred pounds damages. Many such instances have occurred.

Thus, it appears, that the laws forbid the student to dissect, and the constituted authorities, under the sanction of the laws, require that he should dissect. The medical student in the first instance is persecuted on account of his endeavours to obtain knowledge, and afterwards, when he is engaged in practice, he is persecuted for not having obtained it; and, to make the inconsistency still greater, there is not an individual amongst those who make the laws, nor among those by whom they are administered, who hesitates, when his life is in danger, to apply for assistance to those individuals, who would not have it in their power to relieve him, if they had not devoted a considerable portion of their lives to these forbidden studies.

But it is to no purpose to point out the evils which exist, unless it can be shown at the same time that those evils admit of being removed. The next question then is, how can a more abundant supply of subjects be procured in a manner less offensive to the community?

1st, As the laws are now construed by the law authorities, the possession of a body for the purpose of dissection is in itself a misdemeanour, except it be that of a person hanged for murder. The first thing then to be done is, to declare by an act of the legislature that dissection,

for the purpose of procuring knowledge that may be useful in medicine and surgery, is legal and proper.

2dly, That a dead body should be dissected is of no consequence to the individual who is no more, but a knowledge of it being so may be distressing to the feelings of the surviving friends and relations.

This sufficiently points out what are the proper subjects for dissection; namely, the bodies of those who die without any friends or relations. In small towns and villages, probably, there are none who die under these circumstances, but in large cities, and especially in the metropolis, there is a great number. Whoever will take the trouble of referring to the Report of the Anatomical Committee, will find that in London the number of these amounts to many more than would be required for the supply of all the anatomical schools. These bodies are now buried at the expense of the public, and if authorized to do so, the churchwardens and overseers would in most instances readily give these up to the teachers of anatomy.

But it may be urged in opposition to the adoption of the plan proposed, that it will be considered as a very harsh and arbitrary measure on the part of the legislature to point out any particular class of society, as furnishing subjects for dissection, while the other classes are exempt. This objection relates, of course, not to the sense and deliberate judgment, but to the feelings of the public, and it is easily answered. Let it be declared, not who are, but who are not to be dissected. Let it be enacted that dissection is lawful, but that no one is to be dissected contrary to the wishes of his friends or nearest relations. The result will be the same, but the offence to the public feeling in this last case will be none at all.

It may be said, also, that there are some individuals who have a horror of being dissected after death, and that it will sometimes happen that a poor man dying in a workhouse, with no friends around him, will have his sufferings much aggravated, if he believes that his helpless and friendless condition is to lead (as soon as he has breathed his last) to his body being conveyed to an anatomical theatre. Undoubtedly, such feelings ought to be respected. It

would be cruel to disregard them, and it is very easy to meet the objection which arises out of them. Let it be declared further, that no one is to be made the subject of dissection who has declared by his last will and testament his wish to the contrary.

Again: it may be considered as wrong, on religious grounds, that any individual should be denied the act of sepulture, and the performance of the funeral service over his remains, after death. It may be answered to this objection indeed, that these are mere human institutions, concerning which not one word is said in the Old or New Testament. But there is no occasion to meet it thus. After the body has been dissected, let the remains be inclosed in a coffin, and conveyed to the grave in the usual manner, and with the usual ceremonies; or the funeral service may be read over it previous to dissection.

There will be some who will, probably, still urge another objection; namely, that the public feeling is so strongly opposed to dissection, and that the lower orders especially are so much prejudiced against it, that a general clamour will be raised if there be any kind of legislation on the subject. But those who argue thus must have formed their opinions on what they have heard and seen in the country, in villages and the smaller provincial towns, and can know little of the state of feeling in the larger towns, and especially in London. The fact is, that in London there is literally no horror of dissection in the abstract. The thing has become in some measure familiar to the minds of the inhabitants, and especially of those who belong to the lower orders. Persons who reside in the neighbourhood of an anatomical theatre continually see boxes and hampers taken into it, which they know to contain subjects for dissection, and such an occurrence scarcely causes an observation among them. It is only when the bodies of their relatives and friends are exhumed and dissected that their feelings are excited; and instead of being excited further, these feelings are likely to be allayed by the adoption of a plan for the dissection of the unclaimed bodies, inasmuch as it would put a stop to the present traffic with the resurrection-men, and the robbery of churchyards.

Nor is the plan proposed to be re-

garded in the light of a mere experiment. It has been already tried in most parts of the continent of Europe, in Protestant countries as well as Catholic, and it has succeeded perfectly, and surely there is no such peculiarity in the English nation as ought to lead us to believe that that which has succeeded in nations so different as the French and Prussians, the Dutch and the Italians, would not succeed in England also.

Of course, these observations are founded on the supposition that dissection is carried on in a discreet and decent manner, and if it should be recognized by law, and a more abundant supply of subjects should be procured under the sanction of the state, some precautions may be necessary to prevent the evil which would arise from it being too openly practised, or being brought under the notice of the public in a disgusting or offensive shape. It will not be unreasonable to require of the teachers of anatomy that they should preserve a register of all the bodies which they receive for dissection, naming the source from whence they are obtained. It may be proper on all accounts to insist that those who undertake to be teachers of anatomy should prove their fitness for the office by passing a rigid examination before the College of Surgeons of London, Edinburgh, or Dublin, or some other competent tribunal. This will at any rate limit the number of anatomical teachers in the best possible manner, namely, by the exclusion of uneducated and ignorant pretenders; and by confining this department of medical instruction to men of industry and science. It may be admitted as a question also, whether in addition to these measures it will not be advisable to insist that no one should be permitted to open dissecting rooms for the admission of students without a license to do so from the secretary of state, or from some person especially appointed for the purpose, to whom a satisfactory security must be given for the proper regulation and conduct of the establishment.

Of the foregoing observations, there are probably very few which have a claim to the merit of originality; the subject having been so frequently discussed, especially among medical practitioners, with whom the present obstacles to anatomical instruction have long been a subject of serious anxiety.

This last circumstance has led to a misapprehension on the part of the public. It is very generally believed that the members of the medical profession are a party concerned, and that they have an interest, beyond that which others have, in obtaining greater facilities of dissection. This is true as far as it relates to the teachers of anatomy and the students; but the former are very few in number, and the latter are not of sufficient importance, and are too limited in their acquaintance and connexion for their sentiments to be much regarded, or even to be known. It is not true as to medical practitioners generally. They have laid in their store of knowledge. They rarely find it necessary to return to the labours of the dissecting-room; or if they wish to inspect the dead body for the purpose of satisfying themselves as to a particular point, they have ample opportunities of doing so in the post mortem examinations made for the purpose of ascertaining the cause of a patient's death.

If the existing race of medical practitioners were so narrow-minded as to consult only their own private interests, they would be pleased to see the rising generation brought up in comparative ignorance, inasmuch as it would make it more difficult for themselves to be superseded in their practice as they advance in years. If they have been more active than others in calling the attention of the legislature to the subject, it has been on purely public grounds; not because they expect, or can expect, any benefit to themselves, but because their peculiar situation makes them more competent than other individuals can be to form a judgment of the mischiefs which may ultimately arise to the community if nothing be done to remove the existing evil.

LEAVING THE BODY FOR DISSECTION.

To the Editor of the London Medical Gazette.

SIR,

THE enclosed manuscript is an extract from the Will of a gentleman of property, by which he bequeaths his body to Mr. John Hunter, for dissection. In each of two codicils, added sub-

sequently to Mr. Hunter's death, he expresses the same wish, transferring the bequest to the late James Wilson, Esq. Lecturer on Anatomy, in Windmill-Street. I have sent the papers to you for publication, as instancing the respect entertained for the study of anatomy by men of sensible and benevolent minds, in this country, forty years back; a period prior to the events which introduced the present "age of liberality." The bequest is not one of momentary whim, or indifference of temper; it is renewed in 1809, twenty years after the date of the original will; the testator's property is charged with the payment of a sum of money to the anatomical teacher who should execute his wishes; and the directions for the interment of his remains after dissection, are, you will observe, somewhat fastidious in their detail.

I am, Sir,

Your obedient humble servant,

A PHYSICIAN.

London, August 1829.

"Having, by my late Will, dated the 16th day of February, 1788, bequeathed to John Hunter, Esq. anatomist, twenty guineas, on the condition of his dissecting my body; which bequest will appear to many persons whimsical, ridiculous, and absurd; I take leave to give my reasons for such bequest; not in expectation of altering the opinions of survivors, but hoping such reasons may entitle me to some degree of forgiveness. I adore and humbly thank my Creator, for having bestowed on me the inestimable blessing of a feeling heart. The greatest comfort I enjoy (and it affords me unspeakable satisfaction) is a consciousness that the governing principle of my life hath been to endeavour to do as much good to my fellow-creatures as my confined sphere of action admitted of; and to the little services I have attempted to render them during my life, I would, if possible, add a real benefit for their good after my death. This real benefit appears to me likely to be effected by the dissection of my body; for, supposing no new discovery shall be made (as I trust there may be) by such dissection, yet my carcase will answer the purpose of any other common body, for the instruction of pupils in anatomy; and with that view I do hereby request Mr. Hunter, or the surgeon who shall

dissect my body, that, after having himself examined the particular parts necessary for the observations I am desirous should be made for the benefit of survivors, he will be pleased to permit the rest of the carcase to be dissected by (or for the instruction of) pupils in anatomy; and for that purpose it may be kept by the surgeon for a fortnight, month, or longer, until all the use that can be made hath been made of it for such instruction; and then I request Mr. Hunter, or the other surgeon, to collect the skull, and all the bones, once mine, and to put them (no matter how laid) into a small leaden box, which I have provided for that purpose, and which will be sent with my body to Mr. Hunter; and which leaden box, with the bones, I desire may be put into a wainscot coffin, of the common dimensions for a man of my size (about five feet seven inches), and kept steady in the coffin by logs of wood on each side the box, and let the coffin be filled with mould, clay, or ashes, and then sent by sea, as directed in a codicil to my Will, dated the 24th August 1792. And I desire that a fair copy of this writing may be made, on as many leaves of strong vellum, not exceeding six inches square each, as shall hold it, written on one side only, in a very fair, large, round hand, and put into a little wainscot case, or box, just large enough to hold the copy. Let the box be airtight, if possible; and, after the copy is put in, let the box be dipped in some bituminous preparation that may wholly exclude the air, and then placed in the leaden box with my bones."

PULVERIZATION OF CALCULI.

To the Editor of the London Medical Gazette.

SIR,

As Baron Heurteloup had no part in the account of his demonstrations inserted in your Gazette, or in the Lancet, it is not necessary that he should answer Mr. Costello's defence of M. Civiale, or rather, attack upon himself. So far from any defence having been called for, I can state that at the second demonstration (at which I was present),

M. Heurteloup, to his credit, made most honourable mention of M. Civiale, in according to him the priority of the introduction of the operation of lithotomy; and that with great good sense he scarcely touched upon the disputed point of the priority of invention. However much M. Heurteloup may court publicity and free discussion on the merits of his instruments and practice, it is not likely that he should enter into a personal discussion concerning them. I can only refer you, Sir, and your readers, to the Report of the French Academy Royal of Sciences for the year 1827, in which you will find the necessity for improvement in the instruments previously in use, and the merit of those introduced by M. Heurteloup (both which points are disputed by Mr. Costello), sufficiently proved.

In his letter to you, Sir, in speaking of your account of the "*pince à trois branches avec le perforateur à virgule*," he says, "there is, I fear, considerable misapprehension on the part of the writer of the note;" and then proceeds to describe, in the words of the report, a different instrument of M. Heurteloup's, called the "*evident*," to prove the existence of a mistake of which he himself is alone guilty, and gives a whole column of M. Civiale's objections to the latter instrument, which apply to the former only just sufficiently to deceive a person unacquainted with either. It seems, then, that Mr. Costello is ignorant of the existence of one of these instruments, and of the nature of both, as he applies M. Civiale's remarks to the wrong one.

In his letter to the Lancet he says, the "*pince à forceps*, formerly called the *pince servante*, consists of nineteen pieces." It is impossible for a person who has once seen them to confound the "*pince à forceps*," or "*maitresse pince*," or "*instrument à quatre branches*," which are one and the same, with the "*pince servante*;" and the very use of the latter, which suggested its name, would render this mistake as impossible to one acquainted with it, as the idea that it is composed of nineteen pieces, instead of, I think, two. Mr. Costello's mistake will be accounted for by comparing his remarks with the previous description of the instruments in the Lancet of August 1. The first part of the paragraph which describes the "*pince à forceps*," refers to this instru-

ment with its perforator; next the "*pince servante*" is described as introduced within the former, and the period abruptly concludes with these words—"The *pince à forceps* consists of nineteen different pieces." This immediately accounts for Mr. Costello's referring the concluding remark to the description of the "*pince servante*," which preceded it, and his consequently making the "*pince à forceps*" and the "*pince servante*" one and the same instrument.

It is worthy of remark, that the "*evidetur*," which is used with the "*pince à forceps*," is not mentioned in either the Gazette or the Lancet, which will account for Mr. Costello's ignorance of its existence.

I have only to recommend to yourself and your readers, to refer to the documents I have mentioned, and to judge for yourselves.

I am, Sir,

Your obedient humble servant,

A DISINTERESTED OBSERVER.

August 12, 1829.

SOME OBSERVATIONS

RELATING TO

THE FUNCTION OF DIGESTION.

By A. P. W. PHILIP, M.D. F.R.S.
L. & E.

No arguments are necessary to convince us of the importance of that function on which all parts of our frame depend for their nourishment. In one respect its organs may be regarded as of greater importance than even those which are more immediately essential to life. The sympathies of the stomach and first intestine are both more powerful and more extensive than those of any other part, and consequently more generally and in a greater number of ways contribute to the cause, and influence the course of all our more serious diseases.

I am induced to trouble the Society with the following observations, in the hope that I shall be able to place before them some points relating to the function of the stomach in a clearer point of view than has hitherto been done. In former papers which the Society have

done me the honour to publish, and more fully in a Treatise on the Vital Functions, I have endeavoured by experiment to trace the different steps of the process of digestion in the stomach. It appeared that the food remains in a quiescent state, except that the part of it which lies next the stomach, as soon as it has undergone the effect of the gastric juice, is, in consequence of food thus prepared exciting a peculiar action in the muscular fibres of this organ, carried on towards the pylorus; through which it is propelled into the intestine, the next portion of food thus brought into contact with the stomach undergoing the same process; and so on, till the whole is in a state proper for that part of the digestive process which belongs to the first intestine.

Thus the muscular fibres of the stomach are in continual action during its function; for the gastric juice pervading the contents of the stomach to a certain extent, the change effected by it on each particular portion of the food is nearly completed before the food is actually in contact with the stomach, as may be seen by inspecting that of an animal killed a few hours after a meal; and consequently is not detained when in contact with it. There is therefore a continual motion of the food in contact with its surface towards the pylorus, and the less digested part is continually approaching its surface.

It follows, then, that a failure of the function of the stomach may arise either from a proper gastric juice not being supplied, or the muscular power of the stomach failing to carry onward the digested part, and thus regularly to present to the stomach a new surface of food to be acted upon by that juice. It further appeared, that for the first of these purposes the power of the nervous system is necessary, the secretion of gastric juice failing as soon as the stomach is deprived of any considerable part of this power; but that the nervous power is not necessary for the other, the muscular power of the stomach still carrying on towards the pylorus any digested food which happens to be in it, or any food which had been acted upon by gastric juice which happened to be in it at the time, however much its nervous power be impaired; and this office is, as far as we can see, as readily performed as when the nervous power of the organ is entire.

The muscular fibres of the stomach, therefore, are stimulated by its contents, in the same way as those of the heart by the blood, the usual action of both being wholly independent of the nervous system, and inference confirmed by many other experiments beside those here referred to.

I have, as appears from the papers which the Society have done me the honour to publish, attempted to go a step further, and to shew experimentally that the office of the nervous power in preparing the gastric juice, may be correctly imitated by exposing the living stomach to the influence of a voltaic pile after the supply of nervous power is interrupted. Those who were at first inclined to doubt this fact, have since publicly acknowledged, on witnessing the experiments, that the digestive process of the stomach supported by galvanism, is, as far as we can see, as perfect as that supported by the nervous power itself.

It is therefore evident that, in the formation of the gastric juice, a chemical power can be substituted for that of the nervous system. I do not mean that, strictly speaking, its formation is to be regarded as a mere chemical process, because it is only in a living stomach that galvanism can have such an effect; but this effect bears too strong an analogy to other chemical results to be wholly separated from them, although what we call life, whatever that may be, is necessary to its production.

The same effect, and one certainly of a very complicated nature, is here produced by the nervous power and a chemical agent; because when the latter is substituted for the former, the same effect takes place. It is a simple matter of fact. But it is maintained by some gentlemen that the same effect may be produced by a mechanical agent*. They have related several experiments which appeared to them to prove, that when after a part of the eighth pair of nerves is removed, and thus the due secretion of gastric juice prevented, it may be restored by mechanically irritating the cut ends of the lower portions of the divided nerves. If such be the fact, it must materially influence

our views both with respect to the function of digestion and the other secreting processes of the animal body.

In judging of the result of such experiments, several things must be taken into the account which appear to have escaped the attention of those gentlemen.

At the time the animal is fed, in preparation for the experiment, there may be some food in the stomach, from previous meals, more or less digested, and there is always some gastric juice ready to act on any new food which may be presented to it. It is evident, therefore, that although the secretion of gastric juice ceases at the moment of the excision of part of the eighth pair of nerves, some digested food must be found in the stomach for some hours after the operation; for, as I have ascertained by numerous trials, many hours are required in such experiments for the stomach to propel into the intestine the remains of food previously digested, or that digested by the gastric juice previously formed.

When, therefore, the contents of the stomach are examined in five or six hours, and generally even in ten or twelve, after the operation, more or less digested food is found lying next the surface of the stomach. But when the animal survives the operation eighteen, twenty, or more hours, undigested food alone is found in it. The cause of so long a time being required wholly to expel the food, which has undergone any degree of the digestive process, appears to be, that as digested food alone excites that action of the stomach which propels it into the intestine, and the more perfectly it is digested, it excites this action the more readily, the last part of the digested food which has but imperfectly undergone the digestive process is expelled very slowly, so that it is very long before food wholly undigested alone is left.

That the longer the animal lives after the excision of part of the eighth pair of nerves, the less digested food is left in the stomach, is a fact now admitted by all who assisted at the experiments. Among the great number who have witnessed and been satisfied with their result, are Sir Humphry Davy, Mr. Thos. Andrew Knight, and Mr. Brodie, gentlemen whose experimental accuracy, in the opinion of the public, has never been surpassed.

* See a paper entitled, *Mémoire sur le mode d'action des nerfs pneumogastriques dans la production des phénomènes de la digestion.* Par MM. Breschet et Milne Edwards (lu à la Société Philomatique, le 19 Février 1825).—(Extract des Archives générales de Médecine.)

Of this fact, the gentlemen to whose paper I have referred are not aware. They maintain, indeed, that the only effect on the digestive process produced by the excision of part of the eighth pair of nerves, is, that it becomes more tedious, being as perfect as when the nerves are entire, if a sufficient length of time be afforded. In speaking of the animals in which part of the eighth pair of nerves has been cut out, and comparing them with the healthy animal, they say—"Enfin, si on laisse écouler un espace de temps plus grand encore entre l'opération et la mort des animaux, on pourra trouver que la digestion est complètement achevée dans l'un comme dans l'autre cas."

It will easily be perceived to what errors, respecting the effect on digestion, of depriving the stomach of the office of the eighth pair of nerves, this misconception must lead. Its effect was increased in the experiments referred to, by the different animals in each experiment having been confined to the same quantity of food. The most hungry would of course digest it fastest and most perfectly. To judge fairly of the result of the experiment, the different animals must be allowed equally to satisfy their appetite—to eat till, from their manner of eating, it is found that the appetite has equally abated in all.

Such are the circumstances which I conceive misled those gentlemen who maintain that they can produce a sensible effect on the contents of the stomach by any mechanical irritation of its nerves.

They also err in supposing that the muscular fibres of the stomach can be excited by irritating the eighth pair of nerves in the way that a muscle of voluntary motion may be excited through its nerves. The digested food is the natural stimulus of the muscular fibres of the stomach in its usual function, as the nervous power is of the muscles of voluntary motion in theirs; and we cannot through the nerves excite the former as we do the latter class of muscles. The muscular action of the stomach resembles that of other hollow muscles, in being excited by its contents.

The mechanical irritation employed by those gentlemen, in endeavouring to excite the digestive process after a portion of the eighth pair of nerves had been removed, was that of a thread

attached to the cut extremities of the lower portions of the eighth pair of nerves, and fastened to the neighbouring muscles, by which the motions of respiration kept the part in a state of constant irritation.

In my Treatise on the Vital Functions, a similar experiment is related, in which the cut extremity of the lower portions of the nerves was fastened to a thread tied round the neck of the animal; by which it was in like manner kept in a state of constant mechanical irritation; yet in the stomachs of the animals after they had lived more than twenty hours (for the experiment was made more than once) nothing but undigested food was found. This experiment, with some others connected with it, was made publicly in the rooms of the Royal Institution; and all who felt an interest in the subject admitted to see the results, nor was there one who expressed a doubt respecting them.

As, however, in the experiments just mentioned the position of the nerves was more disturbed, and the thread was not applied as in the experiments to which I have referred, Mr. Cutler, at my request, was so good as to make the following experiment:—Three rabbits, after a fast of the same duration, were fed in the same way. In two of them a portion of each of the eighth pair of nerves was removed. The third rabbit was left undisturbed. In one of those in which the portions of nerve were removed, the cut end of the lower part of the nerves was, by means of a bit of thread, fastened to the neighbouring muscles, as in the experiment referred to. This rabbit died in ten hours, at which time the others were killed in the usual way.

Mr. Cutler then took out the stomachs of all of them, slit them open, and laid them on the same plate; and Mr. Brodie was requested to examine and give his opinion respecting their contents, without having been told which was which. He at once pointed out the healthy stomach, the whole contents of which had undergone the action of the gastric juice. After carefully examining, and with an instrument moving about the contents of the other stomachs, he declared he could discover no difference in them. Both stomachs were chiefly filled with undigested food, the animals not having lived long enough after the operation for the expulsion of some

imperfectly digested food that still remained in both.

The foregoing experiments convinced those who witnessed their results, that the irritation caused by the attachment of the cut end of the nerves to the muscles, had no effect whatever in promoting the digestion of the food.

Were it possible, as in the case of the nerve of a muscle of voluntary motion, to excite the eighth pair to perform its office after its communication with the brain is wholly intercepted, it is surely impossible that this could go on for many hours, which are necessary for the digestion of the food. A nerve of voluntary motion, if kept in a state of excitement after its separation from the brain or spinal marrow, loses its power in a very short time, at most a few minutes.

The result of the foregoing experiment may be known before the death of the animals. It appears from what was said in the other papers which I had the honour to lay before the Society, and which were published in the Philosophical Transactions, that the effect of the excision of part of the eighth pair of nerves on the lungs, as well as on the stomach, is obviated by galvanism, the animals (the dog and rabbit were those on which the experiments were made) breathing under its influence as freely as in health. It is clear, that if the power of the nerve be restored, its restoration must be as evident in the function of the one organ as the other, these nerves being equally essential to both. In the foregoing experiments both the animals were affected with extreme dyspnœa, the mechanical irritation of the nerves having no more effect in relieving this symptom, than in promoting the due action of the stomach.

Philosophical Transactions, }
Part I. 1829.

ANALYSES OF BRITISH MEDICAL JOURNALS.

MIDLAND MEDICAL AND SURGICAL REPORTER.

No. V. August 1829.

[Concluded from p. 343.]

Case of Ulcerated Stomach, with Remarks. By G. WALDRON, Esq. Surgeon, Bath.

This is an example of schirrus of the

stomach, combined with stricture of the colon and rectum. The narrator expresses his astonishment that no pain was experienced, although the disorganization of the stomach was extensive. It is a curious circumstance, indeed, but one by no means uncommon in such cases.

Cases of Otorrhœa Purulenta. By J. BURNE, M.D.

In our notice of the preceding number of the Midland Reporter, we gave a full analysis of Dr. Burne's paper. The communication before us consists of four cases in illustration.

Two cases of death—in one instance caused by the individual wilfully taking a large quantity of Arsenic; in the other, by accidentally swallowing Sulphuric Acid. By Mr. WM. HEBB, Surgeon, Worcester.

The first case is that of a boy, about five years of age, whose death was caused by swallowing sulphuric acid on the evening of the 22d of April, 1827. The acid was contained in a small jug, which the child took up to drink, supposing it to contain water: it was snatched from his lips almost at the moment it was applied to them. Mr. Hebb attended immediately, and administered as much calcined magnesia and lime water as he could, and then excited vomiting by thrusting his fingers into the pharynx; this operation made the child cry, but he did not seem to be in pain, and soon became tranquil. His mouth was much injured by the acid, and Mr. H. supposed some of it had been received into the stomach. He stated this opinion to the father, and requested him to give the calcined magnesia as frequently as possible; but as the child seemed to be "comfortable," this was neglected. The child became worse during the day, and vomited some dark-coloured fluid; but when visited at eleven o'clock, he was apparently in a sound sleep; his breathing was not hurried, but somewhat laborious, and attended with a considerable noise, whether caused by obstruction in the larynx or by snoring, it was difficult to decide; he could scarcely be roused; there was no tension or swelling of the abdomen, nor did the firmest pressure on the region of the stomach cause any

uneasiness; he had not vomited since ten o'clock; that which he had previously ejected was small in quantity, and of a dark colour.

Another practitioner who was called in, thought that the upper portion of the larynx had principally suffered, and suggested the propriety of making an opening into the windpipe. This, however, was not deemed advisable. The child gradually became worse, and died about four o'clock the next morning; but the particular symptoms are not detailed.

Sectio cadaveris, six hours after death.

—The lips were much swollen; the membrane lining the mouth, and that covering the tongue, might easily be peeled off. The mucous membrane of the œsophagus and pharynx presented the same appearance as that lining the mouth, being whitened, and readily peeling off from the coat beneath. The edges of the glottis were swollen, as was the membrane lining its inner surface, and also the larynx, down to the superior vocal ligaments, but in a less degree. It was loaded with a quantity of frothy mucus. The rima glottidis was rendered narrower than natural by this swollen state of the mucous membrane. On examining the stomach it was found to contain a small quantity of fluid, and several lumps of very black coagula. This organ was most extensively injured: large patches of its mucous coat were entirely destroyed; in two or three places the muscular coat had suffered considerably, so that the continuity of the organ seemed preserved by the peritoneal coat alone. In other parts it was blackened and puckered up. Small fibres of coagulated blood were sticking in the mouths of the corroded vessels. The duodenum was likewise much injured.

The narrator of the case, in some remarks which he makes upon it, dwells particularly on the absence of any symptom by which it could be ascertained that the stomach had been injured, notwithstanding that the destruction of this viscus was so extensive.

The next case is that of a female, 30 years of age, who destroyed herself by swallowing arsenic. This she did on going to bed about eleven o'clock on the night of the 14th of November. Medical assistance was instantly procured, but the unfortunate woman obstinately resisted every attempt that was made to

administer suitable remedies, and she died in rather more than four hours. Incessant vomiting was during this time the most prominent symptom. The stomach contained about three-quarters of a pint of fluid, but no solid food. There was no puckering up or thickening of the coats of this organ; its internal surface was smooth and even through its whole extent, and the folds formed by the mucous coat were perfectly distinct. The most careful examination could not detect any particular abrasion or destruction of this coat, but it was generally much attenuated. It was exceedingly vascular; underneath it were a number of specks of extravasated blood; and the peritoneal coat was inflamed.

The above communication is followed by one from Mr. Woodward, of Pershore, describing a case in which he amputated the penis for what appears to have been a cancerous affection of that organ.

Quarterly Reports of the Worcester Dispensary, July to Dec. 1828. By ROBERT I. N. STREETEN, M.D. Worcester.

This consists of numerical returns and a few observations. The document is chiefly of importance as shewing the zeal and attention of the medical men connected with the institution.

Pathological Facts, with Remarks. By CHAS. HASTINGS, M.D. Worcester.

CASE I.—*Serous Cysts, of a very large size, situated upon the convex surface of the Liver, complicated with Ascites.*

In the 12th number of the London Medical Gazette, Mr. Brodie has published an account of two cases of cysts, containing a watery fluid, apparently connected with the liver, which were successfully treated by puncture. This rare disease appears to have been little, if at all, attended to by pathological writers. The instance of it which I am now about to relate is very remarkable, as the cysts had there attained an enormous size, and much interfered with the functions of the adjacent organs. The subject of this singular affection was a shoe-maker, aged 37 years: he was first seen by me on the 4th of Feb.

1820. The following symptoms were then observed:—

The abdomen was tumid, hard, and for the most part incompressible; there was slight depression extending from about the region of the caput cœcum to the pit of the stomach, at which last place a fluctuation was perceived when he was sitting up, but not when lying down. Had great pain, not constant, in the right hypochondrium, in the back, and in the right shoulder; in which also he had an almost constant sense of coldness; and when sitting upright, had pretty severe pain across the abdomen at the navel; great dyspnoea, except when lying on the right side, and a distressing cough; expectoration difficult; sputum clear, frothy, of a bluish colour, and salt taste. While out of bed, he sat most with his head leaning on a table, the body inclined forwards, and towards the right side. His sleep was much disturbed by unpleasant dreams and frequent startings; his countenance was expressive of great anxiety; excessive emaciation; pulse 120, not weak; respiration frequent and laborious; tongue of a purplish red; appetite pretty good; considerable thirst. He vomited often in the morning a frothy matter; bowels costive; fæces dark coloured; urine scanty, with a light red deposit.

After having been a soldier for seven years, and engaged in active service, he returned home in the summer of 1816, and, in a short time, he became much troubled with dyspeptic symptoms, which he attributed, with great probability, to his sedentary employment as a shoe-maker.

In November 1817 his feet and ankles became œdematous: the swelling proceeded upwards, his face at length partaking of the affection.

In June 1818 he was attacked, for the first time, with pain in the right hypochondriac region and right shoulder, from which time his symptoms gradually increased.

He employed mercurial frictions for eight weeks, by which his mouth was scarcely affected. It was then intermitted for a time, and afterwards renewed, and continued for ten days. Afterwards he did not make use of any medicines, except purgatives, to keep his bowels regular; and laudanum, to allay the violent pain which he frequently experienced. From this time

little change took place in the symptoms, except in degree: the abdomen increased in bulk; the fluctuation below the point of the sternum, which before was perceived only in the erect posture, was now very distinct even when in the supine position; and when he coughed, a considerable protrusion was observed at this part. There was also now distinct fluctuation in the lower part of the belly. The dyspnoea was very distressing, the most trifling motion causing him to gasp, and appear dying for want of breath. His expiration was remarkably forcible.

On the 11th of March, 1820, the operation of tapping was determined upon, and forthwith performed by an incision with a scalpel, about three inches below the point of the sternum: eight pounds of fluid were discharged while he continued in the horizontal position; and when he sat up to have the roller fastened about him, fluctuation was again perceived in the same place, and there was an oozing under the strap by which the wound was closed. On the canula being again introduced, upwards of a pound more of fluid was evacuated.

His breathing was now greatly relieved, and he only complained of pain in the small of his back.

On the 13th (two days after) the breathing had again become exceedingly oppressed, and a canula was passed into the former wound, and four pounds of fluid obtained, from which he experienced relief as before. Pulse frequent, small, and feeble; constant pain in his back and loins.

From this time until the 21st, about twelve hours before death, there was a continual copious oozing from the wound.

Early on the morning of the 22d he died. On the same day his body was examined.

Dissection.—The teguments of the thorax and abdomen being turned aside, and the sternum removed, there appeared to view, in the epigastric region, a fine membrane forming largish cells, from which a fluid escaped on its being punctured. The situation of this membrane was between the peritoneal covering of the liver and the parietes of the abdomen. This appears to have been the seat of the whole of the fluid which had been removed by the operation, as no communication was disco-

vered between its cells and the general cavity of the abdomen.

The lungs were small and remarkably collapsed, and adhering pretty strongly to the diaphragm; but otherwise healthy. The heart was small, but healthy. The cavity of the thorax contained several pints of fluid.

The liver seemed nearly to fill the cavity of the abdomen, and pushed up the diaphragm as high as the second ribs; and it extended downwards nearly to the pubes: its peritoneal coat adhered extensively to the diaphragm. Between this covering and the liver itself, a vast cyst was formed, which contained nearly fourteen pints of bloody serum. The liver, in other respects, was healthy. The spleen healthy.

The large intestines were very much contracted, the diameter of the colon not exceeding one-third or one-fourth of that of the ilium, and the coats were greatly thickened.

In the abdomen were about eight pints of fluid, somewhat viscid and tinged with bile.

There was a small quantity of purulent matter, though no ulcerating surface could be found.

REMARKS.—This singular and interesting case seems well worthy consideration, as the subject of it seems to have fallen a victim to a disease which did not appear to affect the substance of any of the important organs. It is probable that originally the cysts on the convex surface of the liver, which had attained so enormous a size, were not larger than those Mr. Brodie punctured with success; and it is to be presumed, that if the case had been seen sufficiently early for this practice to have been employed, it would have been followed by a like favourable issue.

The case is also very important, as illustrating the necessity of being very cautious in forming a decided opinion of the existence of organic disease of the liver, where there is very evident enlargement in the neighbourhood of that viscus; for the above case convinces us that this state of tumefaction may occasionally arise from extraordinary accumulations of fluid in cysts, at the convex surface of the liver, without any disease of that organ.

This instance also seems satisfactorily to evince, that the cases Mr. B. punctured were really what he supposed

them to be—cysts containing a watery fluid, connected with the liver.

There is also another point to which the attention of the reader should be called—the unnatural situation of the diaphragm, occasioned by the accumulation of fluid at the convex surface of the liver. The cavity of the chest, by this means, was much diminished in size, and hence arose the cough, difficulty of breathing, and disturbed dreams; as likewise the compression of the lungs, and collection of serous fluid in the thorax.

The other papers consist of Hospital Reports, the most important cases in which we shall make our readers acquainted with;—and of some Meteorological Observations, which are only of local interest.

MEDICAL GAZETTE.

Saturday, August 22, 1829.

“*Licet omnibus, licet etiam mihi, dignitatem Artis Medicæ tueri; potestas modo veniendi in publicum sit, dicendi periculum non recuso.*”—CICERO.

COLLEGE OF SURGEONS.

BEFORE expressing our opinion upon any subject, it is necessary to come to some agreement with regard to the meaning we attach to certain terms used in discussing it. What, for instance, do our readers understand by “medical reform?” If they imagine it consists in calling names, and slandering some of the most distinguished men our profession has ever produced, we must crave leave to refer them to our “invaluable” contemporary; for such are not *our* ideas of reform. But let it not on that account be supposed that we are hostile to the removal of every abuse as speedily and as effectually as it can be shown to exist, and the best means of correcting it can be devised. In this “profession of faith,” we conceive that we express all that impartial and

thinking men will require ; but we are aware that it falls infinitely short of what hot-brained declaimers on the one hand exact, while we know full well on the other hand, that there are not wanting those who cannot hear the word "reform" without horror, and who will look upon any admission in its favour as apostacy from those principles which we have ever avowed ; namely, the support of the honour and dignity of the medical profession.

Understanding, then, by "reform," improvement, and not destruction, it may at first sight appear extraordinary that any should object to it : yet it is not, perhaps, to be wondered at that those who have grown grey under a system which in their eyes, at least, has worked well, should feel reluctant to abandon views to which they have been accustomed from their youth, and to adopt others which have been presented to their notice through a medium which falsifies and distorts every object. If this be no argument against the propriety of reform, it must convince every candid man that they who differ from him in opinion may do so without necessarily being influenced by dishonourable motives. But it is not, in reality, from the obstinacy of the "powers that be," so much as from the intemperance of those by whom they have been assailed, that the cause of rational and legitimate reform has been so long delayed. We have only to cast our eyes over the events in the political world, to see the counterpart of what has taken place in a little way among ourselves. Parliamentary reform, for instance, was one of the great objects of a party respectable alike by their talents and their influence, and it is probable that some important measures might have been effected, but for the crowd of wild and visionary, not to say knavish and unprincipled politicians, who carried

their ideas to excess, and who, by aiming at too much, accomplished nothing. What did the blasphemies of Carlisle, the ravings of Cobbett, or the declamations of Hunt, ever effect in any cause which they espoused ? From the hour that their names were associated with reform, it became a byword and a scorn : those who had originally supported the cause saw that, for the time at least, it was lost, and the feats of its new friends began and ended in inflammatory speeches and tavern brawls.

Very nearly the same thing has happened with regard to the College of Surgeons. The propriety of certain reformatations had suggested itself to many of the most respectable and influential members of that body, and, had the current of professional opinion been left under their direction, it would have flowed in one unbroken stream, and all opposition must have yielded to its power. Every respectable man would have approved of repairing what was weak, and removing what was offensive to public taste ; and that this would have been sufficient for every legitimate purpose, we have a right to infer, must have been the opinion even of some of the most active and zealous of the reformers : else, why sit they now in office ? But when it became the avowed object not to renew, but to annihilate—when an incendiary appeared, practised to inflame, and eager to destroy—then was there a distinct reaction in public feeling, and even those who still retained their opinions were ashamed of their associates. Respectable men gradually withdrew themselves from so suspicious a connexion, and it became apparent to all that the cause was ruined. That we do not force a parallel where none exists, will be acknowledged by any one who will call to mind the names of those who attended the first meeting at the Freemasons' Tavern two years ago, and contrast them with

the pitiful list of those who afterwards figured there. If Wakley could have cut off the heads of the Council as easily as it was said he did those of Thistlewood and his associates, he would have been a very useful man on such an occasion; but as it is, his having become a partizan in the cause was the most unpropitious event for the reformers, and the luckiest circumstance for the College, that could possibly have happened.

It is rumoured, however, that the Council are even now engaged in deliberations connected with the courses of education to be required of surgical students, and in revising some of their other regulations. If so, we respectfully, but most earnestly, recommend to their notice the propriety of establishing some order of succession in which the different branches of study are to be pursued.

In laying down a plan of education, it is idle to determine that certain studies should be prosecuted unless care be taken at the same time that these are well directed and properly arranged. A boy who is to learn Greek and Latin is in the first instance instructed in the grammar of these languages, and from thence he proceeds to construe and compose. If he were to pursue the subject in any other manner, his progress would be comparatively slow, and he would be very ill-grounded in his Greek and Latin after all. Now anatomy, which includes, or ought to include physiology, may be regarded as the grammar of surgery; and those who learn anatomy first will be much more fitted to acquire a knowledge of surgery, and will be much more likely to become accomplished surgeons, than they who reverse this mode of proceeding, or who endeavour to acquire a knowledge of both at the same time. But how stands the case at present? The College of Surgeons require that the surgical stu-

dents shall attend three courses of anatomy, and the practice of an hospital for one year. It is the custom of the great majority of students who come to London in October to enter themselves as pupils to the anatomical lecturers and the hospital at once; and having thus "entered," they pretend to pursue their studies in both places at the same time. We say *pretend*, for it is really a pretence, and nothing more. Without detracting from the importance of anatomical lectures, it must be acknowledged that anatomy is to be learned chiefly in the dissecting-room, where the student may be well employed during the whole of the early part of the day in attending the demonstrations, in dissecting, and watching the dissections of others when he is not at work himself. But as things now are, he quits the dissecting-room at an early hour, to follow the surgeons round the hospital; and from thence hastens back to the anatomical school before the visit of the surgeons is completed, in order that he may be in time for lecture, having had no opportunity of investigating any of the cases, and having scarcely had leisure to hear the observations made by those who are better informed than himself. We are aware that there are many who obtain a more complete education, and to whom these observations do not apply, but we appeal to all those who have any acquaintance with the subject, whether they are not generally correct, and whether the great majority of students, from thus mixing their studies together, do not return home with much less useful addition to their stock of knowledge than they might have attained if they had employed the same time in a more judicious manner. For this, however, the remedy is very simple. Let them do one thing at a time; let their certificates shew that they had attended lectures and dissections before they commenced their hospital studies. Two courses of

lectures and dissections might then, perhaps, be deemed the minimum of anatomical study. At any rate, we are satisfied that if the students generally were to direct their labours thus, they would in two courses learn more anatomy than they now do in three; and they would afterwards, by bestowing their undivided attention on the hospital, obtain a great deal of knowledge where they now learn comparatively little.

Let them not be deterred by the clamour against the Apothecaries' Company, who have lately adopted an arrangement analogous to what we now suggest. There may be mistakes in some of the minuter details, but the principle is unquestionably good, and worthy of imitation.

One of the regulations of the College of Surgeons which has given most general dissatisfaction in the country is, the preference shewn to the London and certain other schools. It will be remembered that attendance at any of the great provincial hospitals during four years, is only recognised as equivalent to six months in London, Dublin, Glasgow, Edinburgh, or Aberdeen; and, as we formerly pointed out in an early number of the Gazette, (vol. i. p. 316), the arrangement is such as would lead us to suppose "that in the estimation of the Council of the College of Surgeons, there is as much information to be derived from seeing *one* patient at Aberdeen as from seeing *sixteen* at Newcastle, Leeds, Nottingham, Bristol, or any other provincial hospital in England;" while, with regard to the remaining six months, no period is deemed sufficient to form an equivalent. The admission of some of the provincial towns to more equal terms than these is a demand so obviously just that we have no hesitation in saying, not only that the College ought, but that they must concede it. It is a concession which

they owe to the improved and improving condition of the medical schools in various parts of England, and to the learning and talents of the teachers connected with them. Nay, it is even their interest to do so, for their funds depend upon the estimation in which their diploma is held; and at present this is little more than an honorary distinction, as the law does not compel any one to be provided with it for the purposes of civil practice.

If, then, the College of Surgeons should persist in withholding a boon to which their provincial brethren think themselves entitled, and if this opinion should be echoed, as we are sure it would be by the public voice, then would the means of retaliation be easy. Young men of provincial education would only have to pass the Apothecaries' Company instead of the College of Surgeons; and then what becomes of their revenue?

But while we would recommend this concession in favour of the provincial schools, and while we confidently anticipate that it will be granted, still we are no advocates for its being universal or unlimited. We are very far from thinking, that, as a maxim to guide the education of a profession, it is safe to say, "so the knowledge *be* acquired it matters not when, or how, or where." Were the barriers thus removed, the influx would be beyond the power of any legislative body to control; the character of the profession would be degraded, and the public become the prey of men from every rank of life and every trade who could *grind* themselves into sufficient sharpness to get through their examination; while their knowledge, like the polish on Addison's razors, would only be calculated to deceive the eye, not to prove the temper of the metal. If it be said that an examination is or may be made a test of knowledge, which neither art nor accident can

evade, we deny it. To render it even an approximation to this, the whole system would require to be altered; and with regard to what might be under a new order of things, we would answer, in the words of the Turkish minister, when asked what view the sublime Porte would take of a certain *contingent* event, "we do not give a child a name—till it be born and we know the sex."

The combination of a judicious examination with the necessary evidence of the pupil having been engaged in his professional pursuits during a certain time, and attended certain prescribed courses of instruction, forms the best security which the public can well obtain of such individual being qualified to practise; and we should be extremely sorry to see the scale of medical education in any degree lowered. We would have the College admit some of the provincial schools in the same manner as the Apothecaries' Company have done; but the number so admitted ought to be limited to those places where there are ample means afforded to the student of professional instruction. We would have the scale of education at least as high as it is at present. Indeed, in this respect public opinion has gone before the College, for there are few pupils who could not have produced many more than the required certificates anterior to the passing of their last regulations.

We are clearly of opinion, that instead of throwing open the doors, and, as a correspondent in our last number observes, like a shewman at Bartholomew fair, crying, "walk in, gentlemen, and take any seats you please," the medical corporations ought to do every thing in their power to raise the standard of professional acquirement, and to interpose, *more than they do*, between the public and the incalculable misery often inflicted on them by the charlatan.

Indeed, as to preventing improper persons from practising, we think the charter of the College is lamentably deficient,

and we should most sincerely rejoice to see the present one superseded by another, conferring greater powers. Indeed, it appears to us that the only chance there is of our ever seeing a new charter results, not from Wakley's petition, but from the possibility of the Council themselves soliciting one less confined in its machinery, but more extensive and more definite in its privileges.

As impartial Journalists, we feel called upon to express our opinion that the conduct of the College, as regards the members at large, has improved, and will continue to do so, in proportion as those who have lived more among the present generation of their brethren, and imbibed more of the spirit of the age, successively come into office; and when we look at the list, and see the names of those who must fill up the next vacancies, we are assured of the advocates of liberal but temperate and enlightened measures gaining additional strength.

FATAL CHOLERA? AT CLAPHAM.

ON Friday, the 14th of August, a son of Mr. Day, schoolmaster, at Clapham, aged about three years, having been previously in perfect health, was attacked with violent vomiting, purging, and convulsions. He became comatose, and died in three hours after the commencement of the attack.

The rest of Mr. Day's children, as well as his scholars, amounting in number to thirty boys, between four and fourteen years of age, remained all well the next day. This being Saturday, several of the scholars went home, to spend Sunday with their friends, leaving in the school twenty-two boys: of these, twenty were attacked, between three and nine o'clock on Sunday morning, with vomiting and purging of the most alarming character, attended with a degree of prostration which threatened many of them with immediate death. The appearance of the matters vomited was somewhat various in different individuals, depending probably upon the

liquids previously taken. In some instances it was tinged with green bile, and was of a subacid smell, but in the great majority of cases it was colourless and inodorous. The stools also varied in appearance, but they were for the most part pale, consisting of mucus and muco-purulent matter, slightly streaked with scarlet blood.

The pulse varied also very much in different individuals: in the early stages of collapse it was very frequent, but so feeble as to be scarcely perceptible. When reaction took place, it had, of course, more force, but less frequency. The skin was in most instances cold and clammy throughout; in a few cases it was for a short time hot, and the face was, in these, occasionally flushed. There was a low delirium in some advanced cases, with dilated pupils; but the sensorium was not affected in the greater number of them. None of the little patients complained of pain in the stomach or bowels, beyond the griping which preceded the stools. There was, however, in a few of them, slight tenderness and some tension of the abdomen; and, as far as the exact course of the symptoms could be ascertained in such a scene of confusion, it may be said generally that the disease seemed to come on very much like the tropical cholera, with a short obscure stage of excitement, which was immediately followed by a state of extreme collapse; and that this, under the use of stimulants, was succeeded, in those cases which were of the best aspect, by a stage of warmth, gentle moisture, and general reaction. We have mentioned that the disease was accompanied pretty generally with convulsive action of the muscles; but it may be of importance to remark that this, which amounted rather to a kind of twitch, or subsultus, than to cramp, was confined to the upper extremities.

Such was the afflicting state of circumstances in this unfortunate family up to the afternoon of Sunday. Dr. Spurgin and Messrs. Angus and Saunders, of Clapham, who had been employed from the first in rendering every possible assistance, now requested the co-operation of Dr. P. M. Latham, Dr. Chambers, and Mr. Pearson. At this time another of Mr. Day's sons was evidently sinking, and a third, as well as several of the pupils, were in a state of dangerous collapse; others, again, although not out of peril, were rallying

from the attack. The first question that suggested itself to the minds of the medical men in consultation was, whether the symptoms were referable to any poison received into the stomach. The scrutiny, however, which was instituted with reference to this point led to nothing satisfactory at the moment. It was then determined to examine the body of the little boy who was the first victim of the disease, and who, it should be recollected, died in three hours after he was attacked by it. On laying open the abdomen, the viscera presented themselves in a remarkably healthy state, as far as external appearances went. The liver was of a perfectly healthy size and colour; the gall-bladder was somewhat distended with healthy bile; the peritoneum, throughout, pale, transparent, and perfectly free from any appearance of thickening. On laying open the small intestines, however, it was observed that the peyerian plexuses of mucous glands were enlarged in patches throughout the intestinum ileum, raising internally, without destroying the mucous membrane covering them, into condylomatous elevations: lower down in the small intestine a few of the glandulæ solitariae were similarly affected, and in the ascending colon and transverse arch these latter glands seemed almost universally diseased, giving an appearance of pustulation, or rather tuberculation, to the whole interior of the bowel; the interstices of the tubercles here, as well as in the small intestine, being entirely free from vascularity. The mesenteric and mesocolic absorbent glands in the neighbourhood of the parts most diseased, were congested and enlarged. The stomach was quite healthy. The viscera of the thorax were likewise quite healthy. The contents of the cranium also, which were carefully examined, were entirely free from effusion, or other trace of disease.

The treatment which had been adopted, and which it was determined still to pursue, was, in the first place, to obey the great indication of preserving life by administering stimulants with opiates to those who were sinking from exhaustion and spasm. In the few instances in which the head seemed in the course of the re-action to be affected, it had been deemed right to relieve this symptom by the application of a few leeches to the temples. Besides these means,

it was found necessary to apply mustard poultices to the abdomen, and to wash out the bowels with enemata, administering afterwards full doses of calomel and opium.

Early on Monday another of Mr. Day's sons, a boy of four years of age, sunk under the attack, 23 hours after its commencement. His body was carefully examined a few hours after his death, and exhibited the following appearances:—

The abdominal viscera, when first exposed, appeared (as in the former case) perfectly free from the traces of inflammation or other disease.

The examination of the bowels was commenced with that of the intestinum ileum, in which the mucous glands, both aggregate and solitary, were found generally enlarged, and the mucous membrane covering them in many places ulcerated. The interior of the cœcum, colon, and rectum, however, exhibited no appearance of diseased mucous glands, although the membrane itself was throughout uniformly congested, pulpy, and very easily separable from the subjacent tissue.

The examination was now pursued upwards from the ileum: the jejunum at the lower part was less diseased than the ileum, and as it approached the duodenum was more and more healthy; the duodenum, however, on being laid open, exhibited a pustulated appearance, depending on enlarged follicles, very similar to that of the colon in the former case. The mesenteric and mesocolic glands belonging to the diseased portions of bowel, were enlarged and more vascular than natural. The liver was also quite healthy; the gall-bladder contained more than an ounce of perfectly healthy bile. It was remarkable that the contents of the bowels were nearly colourless, and had no fæculent, or indeed any other peculiar odour. The stomach was perfectly healthy. The viscera of the thorax were likewise quite free from disease. In the head, the ventricles of the brain were distended with about three ounces of serosity; and the sinuses were somewhat more charged than usual with dark-coloured blood. The brain and its appendages were not otherwise diseased.

Most of the boys were removed by their friends in the course of Monday; many of them in a very alarming condition. We shall lay before our readers, next week, what farther particulars we

are able to ascertain with regard to the causes and results of this event. The different articles of food, and the contents of the alimentary canal, &c. were placed in the hands of the gentlemen on the spot, for the purpose of chemical examination.

EXTRACTS FROM JOURNALS,

Foreign and Domestic.

LITHOTOMY A DEUX TEMPS.

I WAS present when Mr. Lizars, of Edinburgh, performed the operation of lithotomy in this town, during the present summer. It was speedily and simply done. One calculus, the size of a pigeon's egg, was easily removed, as soon as an opening had been made into the bladder; when another was discovered, somewhat larger than the first, but owing to the firm contraction of the fibres of the wounded bladder, it could not be readily removed at the time, and Mr. Lizars put his patient to bed, assuring his medical friends that all further attempts to remove the calculus would only tend to bruise and irritate the bladder and adjacent parts, and render inflammation more liable to occur. He was confident, he stated, from experience, that on the third day from the operation, the calculus would be easily removed, with scarcely any pain to the patient. Accordingly, on the day appointed, those who were present at the operation were in attendance, and saw Mr. Lizars gently introduce his finger into the wound, while the patient lay in bed, and then, guiding a scoop along the finger, bring out the calculus, which was as large as a chicken's egg, with all the ease imaginable. The patient, a gentleman of sixty-four years of age, had a quick recovery.

Mr. Lizars speaks highly of leaving the calculus till the third day, when it cannot be readily extracted at the time of the operation. By that time the suppurative process has commenced, and all the parts concerned are quite relaxed. This is the method introduced by the French surgeon Franco, as the *operation à deux temps*, and which has been condemned by some of our modern writers. Mr. Sam. Cooper strongly reprobates the practice of putting a patient to bed with a stone in his bladder; and advises that, rather

than do this, we should make an opening adequate for its extraction; or if this cannot be done, he tells us to break down the calculus, and remove its fragments. If the long and constant irritation of a calculus, or calculi, has the effect of thickening the coats of the bladder, and diminishing its capacity; and if the cutting into that viscus causes its fibres to contract, and firmly grasp the calculus, as the uterus does its placenta when about to throw it off, both of which occurrences experience shows us to be almost invariable attendants on this disease, and the operation for its removal, then all reiterated and painful attempts to remove and break down the calculus will not only be improper, but must also tend greatly to endanger the life of the patient. The cases in which Mr. Lizars has tried this operation *à deux temps*, have been attended with the greatest success, and he has removed, on the third day after the operation, very large calculi with the utmost ease. He has hitherto made one or two gentle endeavours to bring away the calculus at the time of the operation, but if he does not readily succeed, the patient is put to bed. So convinced is this expert operator of the superiority of this plan, that he declared to his medical brethren, at the operation I have just mentioned, that were it his misfortune to be obliged to submit to the operation of lithotomy, he would not suffer the forceps or scoop to be used before the third day.—*Gibson's Medical Sketch of Dumfries-shire.*

DANGEROUS EFFECTS OF INFLATING THE LUNGS OF PERSONS APPARENTLY DROWNED.

The last number of Magendie's Journal contains a report, drawn up by him, on some interesting suggestions of M. Leroy, with regard to the mode of restoring persons apparently drowned. The subject is very important, and if the statements of the latter gentleman be correct, some of the means at present in general use have a direct tendency to destroy the individual, and convert apparent into real death. He found, that when air was blown into the windpipes of certain animals with any considerable force, it produced sudden death. His experiments on this point were repeated by MM. Magendie and Dumeril, and the results were, that sheep, goats, foxes, and rabbits, died suddenly when air was blown into their

lungs, even although this was done with the mouth of the experimenter: dogs were more or less affected, but not destroyed by it. The *modus operandi* of the insufflation appears to consist in the laceration of the delicate texture of the lung, by which the air passes into the cavity of the pleura, and, collecting there, obstructs respiration much in the same way as occurs in certain wounds of the chest. If this view be correct, the fatal result ought to be prevented by making a puncture through the thoracic parietes immediately after having blown into the lungs, and thus allowing the effused air to escape. This experiment was tried on the same class of animals, and succeeded. The cause of death just described, though the most general one, is, nevertheless, not universal; as sometimes bubbles of air were found in the whole of the sanguiferous vessels, apparently from the rupture of some small branches in the lungs; and in other instances no obvious cause of death presented itself. It has been stated that dogs did not suffer like the other animals; a circumstance which appears to depend upon the greater resistance presented by their lungs; so that they did not so readily give way.

In endeavouring to apply these observations to the human subject, we find that direct experiments are wanting; but one circumstance, of rather a curious nature, is mentioned by M. Leroy, which deserves notice. A young man, toying with his mistress, took it into his head to blow forcibly into her mouth, while he held her nose. From this pastime resulted a painful sense of suffocation, which lasted many days. In the absence of experiments on the living body, trials were made on the dead; and in many instances insufflation made by means of a tube introduced into the windpipe through an incision caused rupture of the pulmonary tissue and effusion of air into the chest, both in adults and old persons. But it is remarkable, that in the *fœtus* and very young child, air, although blown with force into the windpipe, did not produce any similar effusion: the utmost was the appearance of a few bubbles here and there beneath the pleura. From these results, however, it would appear that insufflation of the lungs, without due care, may produce death; a circumstance which does not militate against the utility of inflating the chest in cases of asphyxia, but which points

out the necessity of a degree of caution as to the mode in which it is done much greater than writers on this subject seem to have been aware of. It is also to be kept in mind that if the introduction of air by blowing from the lungs of another person has the disadvantage of its being less pure, that propelled by instruments is much more apt to produce dangerous violence. These last have of late been more used than formerly, but the advantage which has been derived from them seems very problematical. During the last six years, 1835 persons have been rescued from the water in Paris; of these only 368 have had attempts made to revive them, of which number 283 have been restored. But if we inquire into the results which were obtained sixty years ago, we shall find that they were considerably more favorable. Between 1772 and 1788, Pia, the founder of the establishment for the succour of the drowned, restored 813 out of 934 in about eight months, being about eight-ninths; whereas, at present, according to the official documents, only two-thirds are saved.

The principal suggestion of M. Leroy is derived from the risk of lacerating the lungs; to avoid which he proposes a particular apparatus, which is favourably spoken of. He also advises the transmission of a galvanic current through the diaphragm, and artificially imitating, as much as may be natural, the movements of the chest by gentle pressure on the thorax and abdomen, alternated with intervals.

FISTULOUS OPENING INTO THE AIR PASSAGES.

A man, named Leblanc, thirty-three years of age, was condemned to the galleys for life in 1820; in consequence of which he attempted to commit suicide. For this purpose he grasped the larynx with the left hand, while with the other he plunged a knife into his throat, passing it transversely from right to left in the space between the cricoid and thyroid cartilages, and then forcibly divided all the parts which were before the instrument. The bleeding was inconsiderable, but the wound was deep enough to intersect the pharynx. He was put under treatment. Fifteen days after the injury the food no longer passed by the opening; and at the end of six weeks that in the larynx was reduced to a few lines in diameter; but at the same

time the superior circumference of the incision was considerably retracted, so that the air could only get to the windpipe through a very small opening. The breathing was difficult and painful, and the patient threatened with suffocation. He again resolved to destroy himself; and with this view he adopted the same means, and divided the same parts. As he would not suffer himself to be dressed, nature effected the second cure. The food came out by the wound during seven or eight days; and after the lapse of some time, the length of which is not mentioned, the breathing again became difficult from the same cause as before. He then bethought him of introducing a tube of lead into the wound, and in the direction of the windpipe. It was two inches in circumference, and one in length; and through this he breathed freely. Six weeks after the second injury the parts were entirely cicatrized, but numerous pieces of cartilage had been passed by the wound. Such is the account of Leblanc himself. His present state is as follows: there is at the anterior and middle part of the neck a fistulous opening into the air passages, which, in its transverse and longitudinal diameters, is from seven to eight lines. From the extremity of the sternum to the inferior edge of the opening, no rings of the trachea are to be felt, and the tube is absolutely necessary in order to receive freedom of respiration. The upper edge is formed by the inferior border of the thyroid cartilage. The opening is at the inferior third of the larynx, and is obliterated above by the approximation of parts, and by a cicatrix in the form of a vault, continuous with the skin and the posterior parietes of the air passage. Near the orifice it is insensible to the presence of foreign bodies, and it is only at the depth of an inch that the lining membrane possesses its vital properties; if it be touched here, the individual has a disposition to cough: the obliteration of this part of the larynx is complete. Leblanc breathes solely by the opening in the throat, and it is by this that he expectorates. With this imperfect mechanism he is able to articulate almost all words in a monotonous manner, and without *voice*, properly so called. We have thus given all the parts of this case which appear to us of any interest; there follow, however, *seventy-three*

pages of discussion about the manner in which the sounds are produced. To this we beg to refer any of our readers—who have nothing else to do.—*Ibid.*

HOSPITAL REPORTS.

ST. GEORGE'S HOSPITAL.

Cut Throat—Exfoliation of Cartilage.

JAMES LLOYD, æt. 42, was admitted June 16, under the care of Mr. Hawkins, with a wound of the throat, inflicted by himself with a razor. The wound was nearly three inches in length, and of considerable depth, having separated the os hyoides from the larynx, and having in part opened the fauces, so that bubbles of air escaped through the wound. He had lost a good deal of blood before his admission, and three or four vessels required a ligature afterwards. The edges of the wound were brought together by sutures and adhesive plaister, and an opiate administered at night, and solid food prohibited.

It appeared that he had been addicted to drinking for a considerable time, so that he had lost his situation as a butler, which had preyed upon his mind, and given occasion to the attempt at suicide. After his admission he was sensible and talked rationally, but the excitement of his mind was shewn by great quickness of speech, and constant hurry in all his movements.

17th.—V.S. ad \mathfrak{z} x.
Enema oleosum.

19th.—He has had a good deal of cough, with expectoration of many ounces of thick mucus daily, without pain in the throat or chest. As the excitement of the brain continued, with the pulse 120 and full, Mr. Hawkins ordered him to be again bled to \mathfrak{z} x. and some oxymel of squills, with ipecacuanha wine, given him for the cough.

20th.—Expectoration easier, and pulse softer. The wound, which had not yet been minutely examined, as it seemed to be uniting by adhesion, was found to be entirely ununited, and the surface of the muscles sloughy, with an irritable appearance of the skin around the wound, which was poulticed with Tr. Benz. on lint.

21st.—Countenance and eyes completely jaundiced, which he is subject to, probably from disease of the liver, induced by drinking.

R Hyd. Submur. gr. iv.
Ext. Coloc. Comp. gr. viij.
Opii gr. j. M. ft. pil. ii. h. s.s.

23d.—Less cough and pain in the throat;

jaundice not increased; no sleep: pulse 98, full. A considerable portion of the skin round the wound has sloughed, and the sound skin has been separated to some extent from the subjacent parts, with sloughing of the cellular membrane beneath it, and of portions of muscle and tendon between the wound and the chin; the thyroid cartilage is exposed, half ossified, and sloughing. The sloughs are now separating, and the wound beginning to granulate, being several inches in diameter in either direction.

R Hydr. Submur. gr. iij.
Ext. Coloc. C. gr. iv.
Opii gr. j. M. ft. pil. ij. h. s.s.

26th.—The irritation in the trachea and larynx has returned, so that he was kept awake the whole night with cough; pulse full and hard.

V. S. ad \mathfrak{z} viiij.
R Haust. Salin.
Liq. Ant. Tart. \mathfrak{m} xv.
Træ. Opii \mathfrak{m} iv. M. 6tis horis.
R Hydr. Submur. gr. ij.
Opii gr. j. M. h. ss.

27th.—Much easier; pulse 104, soft.

Rep. Pil.

July 1st.—He has been going on well with a repetition of his opiates each night, and of calomel once. The wound is healing, and the irritation of the air passages has subsided. Ordered a better diet, and to take the following draught.—

R Ammon. Carb. gr. iij.
Infus. Cascar. \mathfrak{z} x. M. ter die sumend.

4th.—He has again become highly irritable in mind, and looks haggard and emaciated; the wound is again unhealthy, and the granulations have been absorbed.

As Mr. Hawkins believed the state of the wound depended entirely on the general irritation of the system, the physician was requested to see him. Several doses of calomel were prescribed, with a continuance of tonics, and in a few days some bark and wine. During this time the wound again sloughed, and the skin, which had united to the soft parts below, again separated, in consequence of the sloughing. Different applications were tried, the Benzoin appearing to agree best.

14th.—Sloughing not extended; countenance less anxious.

31st.—Health improved considerably, and the mental irritation also subsiding; he is, however, much emaciated, and suffers from occasional attacks of irritation in the trachea, and preserves the yellow tinge his countenance has possessed throughout his illness, though it is lessened. Almost all the sloughs have separated, leaving a considerable part of both alæ of the thyroid cartilage

dead, and of a black colour; with irregularities both on the inner and outer surfaces, where ulceration is going on.

August 11th.—The wound is healing and filling up rapidly, and he is recovering health and strength. The exfoliated portions of the cartilage have been removed, being about a third of each ala.

It is remarkable that there is not the slightest alteration produced in the voice, nor in any of the functions of the larynx, notwithstanding the loss of so considerable a portion of the thyroid cartilage; probably, however, the exfoliation only just reached the attachment of the inferior ligaments of the glottis, and the epiglottis and superior ligaments have become united with the new-formed granulations. The complete dependence of wounds on the state of the system was strikingly shewn in this case, in which such extensive sloughing twice took place from his constitution being so much injured by intoxication, and each time his health improved before any alteration occurred in the wound.

EDINBURGH INFIRMARY.

Excision of the Elbow Joint.

JULY 3d — Isabel M'Lean, æt. 26, admitted under the care of Mr. Liston.

Five years ago she sustained a severe sprain of the left elbow joint; and, in consequence of it having been again sprained about three months previous to her admission, an abscess formed, and gave way on the outside of the arm.

There is now a fistulous opening, and she complains of excruciating pain in the joint. The forearm is partially extended and immoveable, and her health is much impaired.

The fistula was dilated, and, by the introduction of the probe, the outer condyle was ascertained to be denuded, and softened in texture.

6th.—To-day the joint was removed. A longitudinal incision was made on the back part of the joint, and its extremities were crossed by transverse incisions, so that the wound resembled, in form, the letter I. The two lateral flaps were then reflected, and the joint exposed. The condyles of the humerus, the olecranon process of the ulna, and the head of the radius, were removed by the saw. After several vessels had been secured by ligature, the integuments were brought together and retained by stitches.

The articulating cartilages of the humerus and ulna were also entirely destroyed, and a considerable portion of the subjacent bone was likewise absorbed. The cartilage on the head of the radius was slightly ulcerated.

Shortly after the operation she was seized with vomiting, which was allayed by the

exhibition of an opiate. In the evening the vomiting returned, attended with great nausea, quick pulse, difficult and hurried breathing, and suppression of urine. An anodyne draught with sulphuric ether was administered with the effect of checking the vomiting. Ordered a draught of gin and nitrous ether.

7th.—Had incessant vomiting during the night: it has now ceased, but she still labours under dyspnœa. No pain of chest; tongue foul; slight headache; urine natural in quantity; complains of considerable pain in the arm; pulse 130.

10th.—The arm was dressed yesterday, and is looking well; discharge slight and healthy; tongue clean; pulse 100. Ordered ale and light nourishing food.

12th.—Nausea and vomiting again occurred. An abscess was discovered in the hip, and opened, with immediate relief to the patient.

14th.—The limb is supported by a splint, the fore-arm being kept at a right angle to the arm.

Aug. 4th.—The wound has almost entirely cicatrized, and the patient's health is much improved.

Tracheotomy.

Elizabeth Rattray, æt. 32, admitted under the care of Mr. Liston, July 21. Has been in a bad state of health for the last six years, during which period the catamenia have been suppressed. Three months ago she became affected with palpitations of the heart, hoarseness, and great difficulty of breathing, especially during the night, being frequently awakened suddenly by a sense of immediate suffocation. No pain of trachea or chest; no cough; no difficulty in swallowing. She breathes most easily when her shoulders are elevated, and her body bent forward. Sleeps very little; pulse 70, and feeble. Has been bled and blistered without relief.

23d.—The difficulty in breathing having greatly increased, tracheotomy was to-day performed. Very little irritation followed the immediate introduction of the tube, and the respiration was instantly relieved. Has passed a good night; skin moist; pulse 78.

28th.—The size of the tube has been gradually diminished. Her breathing is natural, and, on bringing the edges of the wound together by the finger, she speaks quite distinctly.

31st.—To-day, much against the will of the patient, the tube was removed, and simple dressing applied to the wound.

August 2d.—She feels no inconvenience from the want of the tube. Breathing and speech quite natural.

WINCHESTER COUNTY HOSPITAL.

Case of injury from the Bite of a Viper, treated by application of the Cupping-Glass and the Linimentum Camphoræ, with Remarks.

JOHN POUND, ætat 10, resident of Hursley, was brought to the hospital on the evening of the 24th of June, in consequence of a bite which had been inflicted on the anterior and lower part of his left leg by a viper. The accident occurred at nine o'clock on that morning, and was occasioned by the boy having, whilst collecting strawberries in a plantation, fortuitously stepped on the reptile. The immediate result of the injury, according to the conjoined statement of the boy and his father, was a rapid and extensive swelling of the foot and leg, excessive burning pain, together with extreme tension, so much so as almost to incapacitate him from reaching home, a distance not exceeding half a mile. He had endured much from acute pain in the epigastrium, accompanied with retching, and vomiting of a frothy mucus.

The following were the appearances which presented themselves ten hours from the receipt of the bite:—General ecchymosis and tension of the whole foot, leg, and inferior part of the thigh; the integuments of which had become more or less polished and transparent, but without being œdematous. On minute inspection, five distinct dental punctures could be readily discerned contiguous to each other, somewhat elevated, and surrounded by an inflammatory blush; the countenance anxious; tongue coated with a dense brown fur; pulse small, irregular, and slightly intermittent; temperature of the limb slightly reduced.

A cupping-glass was applied directly over the punctures, from which exuded a few drops of serous fluid, and at the same time three vesications, of no inconsiderable size, made their appearance. The scarificator was now employed, and the glass re-applied, which was attended with pain. A small quantity of blood only was evacuated, which appeared for a time to diminish the tension at the particular spot on which the glass had been fixed, but it very shortly afterwards became as tense as before. The vesications were not ruptured by the operation. The limb was directed to be fomented during the night with poppy fomentation, and the following draught to be taken directly:—

Rx Spt. Ammoniac Aromat. ℥ij.
Tinct. Opii. gtt. viij.
Mist. Camphoræ 3x. fl. haustus.

Eleven o'clock, P.M.—Ecchymosis and tension have increased upon the thigh, and the glands in the groin painful on pressure; pulse 113; the symptoms in other respects much the same. Ordered to repeat the

draught every five hours during the night, and early in the morning to take an ounce and a half of the common cathartic mixture.

25th, eight o'clock A.M.—Has passed a sleepless night. The tension has extended itself up the thigh; pulse 113, weak and fluttering; no appetite; tongue loaded with a brown fur down its centre, the edges red, with a partial dryness; slight thirst; temperature of the body somewhat increased, as well as the injured extremity; the vesications are still entire; the aperient medicine has not yet acted. Ordered—

Ol. Ricini 3ss. statim sumend.

Eight o'clock P.M.—The medicine has not produced any evacuation; the ecchymosis and tension have encroached to such an extent on the abdomen and perineum that the scrotum is completely obscured in the general tumefaction. The patient does not complain of pain (but slight uneasiness from weight and swelling), except upon firm pressure being made, so as to act on the deep-seated parts, more particularly on the inner side of the limb; a great number of very minute vesicles have made their appearance on the whole of the integuments below the knee joint; the heat of skin and thirst aggravated; tongue less furred and dry; pulse 120, weak, but not so irregular; the largest circumference of the calf of the leg, ten inches and a half; of the instep, eight; and of the thigh, sixteen inches. Ordered the spirit lotion to be constantly applied to the leg, and a solution of salts to be exhibited every three hours, until the bowels have been freely opened.

26th, eight o'clock A.M.—The medicine has acted twice copiously; tongue still painted with a brown fur, though moist. The ecchymosis and tension have now reached the left lumbar region, from which it has commenced passing over the abdomen to the right side, which is very tender when touched; pulse regular, but feeble; the admeasurement of the limb is increased one inch. Ordered to omit the spirit lotion, and the Linimentum Camphoræ to be freely rubbed over the affected parts; continue the aperient medicine.

27th.—The integuments of the foot, leg, and thigh, evidently more relaxed, and having the appearance of an extensive bruise; pulse 110, fuller; tongue cleaner; bowels well opened; has a slight return of appetite; the circumference of the limb reduced one inch and a half. Continue the friction with the liniment.

July 1st.—The whole extremity much discoloured, but is reduced to its natural size; the tension of the abdomen has entirely subsided; the appetite natural, pulse 90, tongue perfectly clean, and in fact he is now quite convalescent. The only complaint he has

to make is extreme weakness and stiffness of the leg.

The train of symptoms which manifested themselves throughout the progress of this case, might be clearly referred to two causes, namely, the injury inflicted on some of the branches of the deep-seated absorbents, by the fangs of the viper producing, as a consequence, the local effects, inflammation of these vessels, which rapidly extended to the larger trunks accompanying the great vessels; and, secondly, the action of the poison injected into the wound producing its morbid and specific operation on the constitution, through the medium of the nervous system—the vast accumulation of serous fluid, indicated by the tension which existed from the commencement to the termination of the complaint, depending, no doubt, on a diminished and impaired action of the absorbents—the acute pain produced, exclusively, by pressure made throughout their course up the limb—the evident benefit derived by the stimulating effects of the camphor liniment on the skin—all coincide in confirming the supposition entertained respecting the pathological condition of the affected parts.

Accidents of this description are certainly unfrequent within this district; some few cases, however, have occurred, the great proportion having been attended with precisely similar results as in the foregoing narrative; but when the superficial absorbents have been the more immediate seat of injury, an erysipelatous inflammation has quickly supervened throughout their course—an example of which we not long since had an opportunity of witnessing in the person of a Noble Earl, of robust stature, who was bitten in the fore-arm. A high degree of erysipelas almost immediately ensued, which, in the course of a few hours, extended into the axilla, producing severe constitutional irritation. These unpleasant symptoms, however, in three or four days, began gradually to decline, and at the expiration of a week had entirely disappeared, leaving the patient convalescent.

We feel no hesitation in acknowledging our incredulity and scepticism respecting the frequent fatality so very commonly supposed to be the result of the bite of these reptiles, in this country at least; and, indeed, our recollection fails at present in furnishing us with any well-authenticated instance of death from this cause. We do not, however, for an instant pretend to deny the possibility of such an event, but simply to state our conviction that when death does ensue, it is the consequence of a peculiar irritability of constitution, rather than from the activity of the viperine poison. The climate of Great Britain is well known not to be, by any means, congenial to the full and complete development or perfection of the reptile

species; if, therefore, it be admitted (and there appears no reasonable ground for dissent) that the virulence and intensity of the deleterious secretions of these creatures are intimately dependant on, and modified by, the vigour of their constitutional powers, but little difficulty can remain, by way of satisfactory explanation, as to the comparative inertness of the poison of the viper, indigenous to this country, when contrasted with the deadly venom of the same tribes in more remote but less favoured regions. It has been ascertained, by actual experiment, that dogs may swallow with impunity much larger quantities of the poisonous secretions than Fontana supposed; and that, if it be kept for some length of time, it loses its accustomed acrimony*.

MR. PICKTHORN v. DR. HARRISON.

[We are extremely unwilling to make this Journal the vehicle of disputes of any kind, and more especially on points not strictly professional. We therefore request the parties to take notice that we will insert no more letters on this subject. It is right to state that Mr. Pickthorn's rejoinder was intended by him for publication last week, but did not reach us in time for that purpose.—ED. GAZ.]

To the Editor of the London Medical Gazette.

SIR,

As an answer to Dr. Harrison's remarks, in your Journal of last week, I beg you to insert the following letter, which Miss Orton has addressed to me, on the subject; and which will, I hope, refresh the Doctor's memory, and establish the share of credit due to his veracity.

"To F. P. Burrell Pickthorn, Esq.

"Dear Sir—I have read Dr. Harrison's letter in answer to your statement, published in the Medical Gazette of the 25th July, and I am happy to be able to vouch for the accuracy of your assertion respecting the message sent by you to the Doctor; and I can the more confidently do so, as I received the information *through Dr. Harrison himself!* and in this way:—one morning, soon after you commenced attending me, Mrs. Knight (who is well known to the Doctor) entered my room, and informed me that Dr. Harrison

* From the Provincial Medical Gazette: the patient was under the care of Mr. Lyford.

had been below stairs, and had just *complained* that Mr. Tuson had told him that Mr. Pickthorn had several of my prescriptions, in themselves sufficient to overthrow him on his trial, and that Mr. P. intended giving them up to the College authority!!! This Dr. Harrison must remember. Again: the Doctor sent his friend, Miss Read, to me, who requested me to give up my prescriptions to her; upon my declining, she told me she had given up the prescriptions the Doctor had written for her to a solicitor, and that, if I did not comply, he would be sent to me; and moreover, that, in case of my still refusing, my father and friends would be subpoenaed into court! I, however, positively declined, and sent him word that I was as ready for contention as he could be.

"Why do this if he did not expect my opposition? Again, in a letter which he addressed to my father on the subject, he says, 'my law advisers consider it necessary you should send for my prescriptions, or the College will subpoena you!' These facts prove that he was not only prepared to expect my opposition, but that he left no plan untried which might prevent it.

"I cannot conclude without adding, that Dr. Harrison urged me, for several months, to write my case for publication. As my distortion had decreased, and as my back became lengthened by the process you have described, I was induced to comply with his request, although I constantly expressed my fears of a relapse. The Doctor, however, over-ruled my objections, and assured me my fears were without foundation. After I had continued under his hands for three years, I had reason to *sincerely repent* having written my unfortunate case. This fact *can*, and I trust will, receive confirmation from your own testimony, you having extricated me from my severe sufferings and extreme debility, and also enabled me, by your surgical attentions, to rise *and to walk from my couch*, where I had remained horizontally confined for five years!!! All these facts my friends acknowledge; and I will only add, that I request you will accept my sincere thanks for your invariable and studious attention to my complicated and difficult case; and believe me to remain,

"Dear Sir,

"Your grateful patient,

"SARAH ORTON."

"London, Aug. 12, 1829."

I think this letter conclusive. But one word for Mr. Tuson. The Doctor says, "Concluding that Mr. Tuson, the medical friend who attended me into court, was the gentleman alluded to, I drove directly to his house, and found him at home. After reading the passage quoted above, he told me that the whole statement, as far as con-

cerns himself, is *erroneous*." Why did he not say false? Now I beg to remind Mr. Tuson that I called upon him, requesting an explanation of the circumstance mentioned in Miss Orton's letter; more particularly as Mr. Tuson was then visiting me as my medical attendant and friend: and I was not aware, at the time, that he was on terms of intimacy with Dr. Harrison. Upon that occasion, Mr. Tuson will remember that (after expressing my surprise that he should have constantly heard my opinions of Dr. Harrison without naming to me that he was his friend) I most positively assured him that the prescriptions which I possessed should be given up to the College, if they required them; and authorised Mr. Tuson to state as much to his friend, Dr. Harrison.

Again: the dignified Doctor says, "Mr. Tuson, so far from believing that these prescriptions were to be exhibited in court, did not even know that Mr. Pickthorn was a party concerned in the trial "till after its commencement." Miss Orton's letter proves this to be equally untrue, since Mr. Tuson himself told Dr. Harrison my intention.

There is, Mr. Editor, just as much credit due to this assertion as to that of Dr. Harrison, when he asserted of Miss Orton—"No sooner did her name vibrate on my ears," &c. (see his Statement); but enough is proved to refute Mr. Tuson's "ample and perspicuous contradiction;" and more than enough to settle that Dr. Harrison's "unqualified denial" deserves as much credit as any thing else he may be pleased to assert.—I am, Sir,

Yours respectfully,

F. P. BURRELL PICKTHORN.

30, Southampton Row, Russell Square,
13th August, 1829.

BOOKS RECEIVED FOR REVIEW.

Medicine no Mystery; being a brief Outline of the Principles of Medical Science: designed as an Introduction to their general Study as a Branch of a Liberal Education. By John Morrison, M.D. and A. B. Trinity College, Dublin.

Transactions of the Medico-Botanical Society of London. Vol. I. Part I.

LITERARY ANNOUNCEMENT.

An Introduction to Medical Botany, illustrative of the Elements and Terminology of Botany, and of the Linnæan, Artificial, and Natural Systems, as connected with the Study of Medical Plants. By Thomas Castle, F.L.S. &c.

W. WILSON, Printer, 57, Skinner-Street, London.

THE LONDON MEDICAL GAZETTE,

BEING A
WEEKLY JOURNAL

OF
Medicine and the Collateral Sciences.

SATURDAY, AUGUST 29, 1829.

ABSTRACT OF A CLINICAL LECTURE
ON
CHRONIC ENLARGEMENT OF THE
TESTICLE,

AND ON
FUNGIOUS GRANULATIONS,

Delivered at Guy's Hospital,

By C. A. KEY, Esq.

J. R. admitted April 2, 1829, for chronic enlargement of the testicle and epididymis. The history of the affection is shortly as follows:—On the 6th Feb. 1828, he was admitted into Samaritan's ward for a large and deeply-excavated ulcer on the corona glandis, very sensitive, and putting on an unhealthy appearance. He had had it about four weeks, but had taken no medicine for it. His constitution being a good deal impaired from loss of rest, in consequence of the pain, he was ordered Pulv. Ipecac. Comp. gr. viij. c. Cal. gr. j. omni nocte, and the Lot. Acid. Nitr. to the sore. On the 11th the sore appeared much healthier, and his health improved; when he was directed to take Dec. Sarsæ. C. Hyd. Oxymur. gr. $\frac{1}{8}$, bis in die. By the 14th the sore began actively to granulate, and was ordered to be touched occasionally with Cupri Sulphas. On the 21st he complained of great languor and debility, and also of want of rest. Ammon. Carb. ex Infus. Calumb. prescribed twice a-day, with Dover's powder and Cal. gr. j. at bed-time, as before. On the 10th of March the sore had entirely healed. During the last week his testicles and epididymis had begun slightly to enlarge, but without pain; and as his general health and appearance forbade the further employment of mercury, either to prevent secondary symptoms or to produce absorption of

the effusion in the testicle, he was discharged.

He was admitted again on the 2d of April with both testicles much swelled, and inflammation of the periosteum covering the lower part of the tibia. The epididymis and testicle appeared both enlarged, but so blended as not to be distinguishable from each other. Unless pressed, they gave him no pain. The cords were enlarged. Ordered—Pil. Hyd. Sub. C. gr. v. nocte maneque sumend. Decoct. Sarsa. C. bis in die. From the indolence of the tumor it was intended to have altered the form of pill to the Pilul. Hydrarg.; but on the 12th the testicle appeared to be in a state approaching to suppuration, the skin becoming discoloured and tender when pressed. In a few days, as the fluid appeared to be situated under the integument, a crucial opening was made through the skin, and a small quantity of matter escaped. The bottom of the abscess was covered with a thick layer of yellow scrofulous deposit, and for many days there was no appearance of granulations. The other testicle shortly afterwards underwent the same process. May 27th, his strength becoming reduced, he took Quinin. Sulph. ex Inf. Rosæ, bis in die, and, with a view of reducing the bulk of the tumor, x. gtt. of Tinct. Iodin. were afterwards added to each dose. The surface of the sore was now clean, but his health not improving, he was removed to a more airy ward on the 10th of June. The testicle at this time remained of the same size, and much in the same state, with the exception of the surface of the sore, which had rapidly granulated, and begun to fungate. The edges of the integuments surrounding the sore were

loose and undermined; but his health gradually improved under a combination of capsicum with quinine, taken three times a-day. On the 20th July the testicle appeared to be about half protruded from the scrotum, but had a healthier appearance: he was ordered to take Pil. Hyd. gr. iiss. Quin. Sulph. gr. iij. bis in die; and to dress the sore with Ung. Hydr. Nitr. Oxyd. On the 27th, the pills affecting his mouth slightly, the Pil. Hydr. was reduced to gr. j. bis in die. On the 30th, he discontinued the pill altogether. Under this treatment the fungus has become quite level with the integuments; the latter are cicatrizing rapidly, and the surface of the sores (Aug. 18) is scarcely larger than a sixpence. He is now vigorous, and says that he enjoys better health than he has for the last twelvemonths. A gland in the groin appears disposed to inflame.

Chronic inflammation of the testicle assumes a variety of characters, and is attended with different degrees of intensity, being sometimes confined to a slight enlargement of the epididymis, without even impairing the functions of the part; at others, extending to the substance of the gland, and leading to its entire disorganization. The progress and character of the affection is in a great measure determined by the cause by which it may have been originally excited.

The most usual form of inflammation of the testicle is that produced by gonorrhœa, which is in most cases confined to the epididymis, as the examination of the first case that occurs to your notice will easily convince you: the enlargement of the part is caused by the effusion among the tubes of the epididymis; for a very little reflection will show that the pain and swelling cannot, as is commonly asserted, arise from distention of the tunica albuginea. In most cases the testis itself remains free from inflammation, and rarely, except in very aggravated forms of the complaint, participates in the affection. The chronic variety of this complaint lasts in a very mild form for some time after the acute stage has subsided, producing a slight thickening and hardness of the epididymis; but it never leaves any bad effects in either structure, unless the treatment of the active form of inflammation has been deficient in energy.

A form of chronic inflammation occasionally attacks the gland and epididymis, more especially the latter, in consequence of an irritable condition of the urethra consequent upon gonorrhœa. If a bougie be passed down the canal, it meets with a slight obstruction at the commencement of the prostatic portion, which is neither in the situation of stricture nor gives the same sensation to the surgeon as a stricture does: it seems to be an irritable projection at the extremities of the vasa deferentia, which propagates the inflammation along the cord; for the latter is always more or less thickened under ordinary chronic enlargement of the gland.

I notice the above forms of inflammation to which the gland is subject, in order to draw a distinction between them and that form of the disease which we term scrofulous, and which gives rise to this prominent fungus from the part, the treatment and nature of which it is my wish to explain.

The peculiar character of scrofulous action, you are of course aware, consists mainly in being attended with a deposit of a cheesy or tubercular nature; and, unlike other effusions the result of inflammatory action, it is incapable of being organized, and, as far as we know, is not readily taken up by the absorbents. The only change to which this tubercular matter is subject, is a softening, or gradual conversion into a purulent fluid; in this way the effused matter is got rid of in the form of an abscess. When attacking the testicle, it assumes three different forms, according to the seat of the affection, and the extent of the diseased action.

It is frequently confined to the epididymis without being the result of a gonorrhœal affection, and appears either confined to one spot of this structure, or is diffused throughout the entire mass of the tubes. When the latter is found by dissection to be the case, the testicle usually participates in the disease, and is found to have undergone a complete change of structure, as well as the epididymis. But the scrofulous action may be excited by a blow in one part of the structure, while the remaining part of the epididymis and the testicle continue sound. The diseased mass then appears at first in the form of a chronic tumor attached to the lower part of the epididymis, free from pain, and exceedingly inactive in its progress. Its form

and character lead to the supposition of its being a common chronic tumor, and extirpation is often proposed as a remedy. If time be allowed, it gradually softens, becomes slightly painful on pressure, and soon reddens the skin. Its character as a chronic abscess becomes complete. When opened, the fluid is found to be purulent, and, at the bottom of the cavity, the convoluted tubes of the epididymis can be traced, extremely sensitive when touched, and the interstices between them filled with an unhealthy scrofulous secretion. The treatment of such tumors consists in forwarding suppuration by stimulating applications, until the whole contents are puriform. It is better to defer opening them until the tubercular matter is entirely softened into a puriform fluid, as an earlier opening does not expedite the progress of the swelling, and is likely to produce a high degree of inflammation. The careful dressing of the cavity is the next point that should interest the surgeon, in order to prevent the formation of a fistula, which can only be effected by inducing granulations to spring from the bottom of the abscess, and gradually to fill the cavity. A fistulous sinus is the usual termination, from want of care, in which these complaints present themselves: it is often exceedingly difficult to heal.

When the gland itself is the seat of the disease, without involving the epididymis, which is by no means unfrequently the case, it usually is found to arise either from a blow, or to follow the exhibition of mercury for a venereal affection. Such a chronic enlargement is attributed by some surgeons to venereal action; it appears rather to be engendered by the action of mercury long continued in a constitution predisposed to scrofula. I am disposed to think that it never follows as a truly venereal affection, as I have never seen it combined with syphilis, unless mercury has been freely given; and, on the other hand, it often follows a mercurial course prescribed for other complaints, as in the instance of mercury given for gonorrhœa. When the epididymis is free from disease, we nevertheless find the cord enlarged, in consequence of a general thickening which the tunics of the part undergo; for, in dissection, the cellular investments of the cord are found very dense and firm, from the long distention to which they have been submitted.

The difficulty of distinguishing with certainty between common chronic enlargement of the gland and tubercular or scrofulous action, I admit to be considerable. The principal points of distinction are, the kind of constitution in which the disease occurs, and the aspect of the patient: also, ascertaining the circumstances to which he may have previously been exposed, and whether they be such as are ordinarily found to be favourable to the development of scrofulous action, will assist in determining the nature of the affection. Other decisive evidence will be found in the swelling not being benefited by the treatment to which common glandular enlargement yields: the internal exhibition of iodine, or of calomel and opium, with the local application of the lin. hydr. camphoret. aided by the horizontal posture and local depletion, usually makes an impression on the one which it fails to do on the other.

The testicle will frequently remain for months in the same indolent state, until some accidental cause excites an action, by which the tubercular matter is softened, and the whole diseased mass is converted into a depôt of pus: during this process the part becomes more painful, and the anterior portion of the scrotum assumes a bluish or dusky-red tint; at this part ulceration will take place, unless the surgeon opens the abscess with the lancet. The propriety, however, of this is doubtful, for the fungus that commonly appears in a few days after the matter is discharged, is attributed by the ignorance of the patient to the interference of the surgeon, and his credit becomes endangered. I do not think that much good is obtained by opening the abscess: it may possibly somewhat diminish the extent to which the matter burrows; but even this is doubtful, and is not productive of sufficient benefit to counterbalance the evil I have alluded to. As soon as the abscess is opened, a dense layer of scrofulous matter is seen at the bottom of the cavity, which is gradually dislodged by the suppurative process. The granulations then begin to rise, until the cavity is quickly filled; the aperture in the scrotum becomes distended by the granulating mass, the fungus at length shoots above the level of the scrotum, and continues to increase until the gland itself seems to protrude from the aperture. The appearance of the diseased mass is sufficiently formidable to those

who are acquainted with its nature ; but to those who are not aware of the cause and character of the fungus, it conveys an idea of being wholly irremediable without an operation. To treat this disease with success, it is necessary that you should have clear views of the nature of fungous granulations in general, of which this complaint in the testicle forms an exaggerated example.

There used to prevail formerly among the older surgeons, the same ideas relative to the nature of fungous granulations, that are confined at the present day to ignorant unprofessional persons, who hold in abhorrence all such appearances under the term of "proud flesh." Whenever a sore sent forth an exuberant granulation, it was doomed to disappear under the application of the sulphate of copper or lunar caustic, which were the regular attendants upon hospital surgeons of old. The practice was bad, because the principle was erroneous: had they possessed a correct pathology in regard to these granulating appearances, they would have looked upon them rather as evidences of a healthy, than as the result of a morbid action.

Fungous granulation is the result of a healthy action in the part in which it takes place: it is exuberant, because the surrounding surface of the sore is unable to keep pace with it in producing granulations; for if a granulation be so circumstanced as not to be able to inosculate with the surrounding structure, the same action which first caused it to grow will also cause it to increase or to fungate until its object is fulfilled; that is, until the action of its vessels be usefully engaged in forming anastomoses with neighbouring granulations, and in repairing the loss of substance. This may not be easy to understand in theory; let us, therefore, render it more clear by examples.

First, I will beg you to contrast the condition of the two testicles which I now place before you; in one you observe the entire body of the gland converted or degenerated into a mass of tubercular deposit, the centre of which is softened into a purulent fluid, and communicates with a fistulous sinus, leading to the exterior of the scrotum. Observe that there is no appearance of fungous granulations, nor is it at all probable that they would have been produced; the natural structure of the gland is destroyed—there are no remains

of tubercular structure from which they could spring; the whole is converted into a mass incapable of furnishing granulations. A testicle so circumstanced retains, when healed, no vestige of the original gland; it presents only a capsule, or tunica albuginea; the scrofulous deposit gradually softens, and escapes by the opening in the serotum; no attempt at healthy granulation appears, and the patient recovers from the disease, emasculated. Examine the other testicle, from which a large mass of fungoid granulations has sprung, and you will see no signs of tubercular deposit; the disease is gone, and the attempts at reparation are alone visible. The scrofulous matter having escaped, the granulations spring from the tubuli of the gland, and projecting through the opening in the tunica albuginea, become exuberant in consequence of the morbid condition of the parts between the integuments and the base of the fungus. As soon as the under surface of the integument is put into a condition to granulate with the base of the fungus, the latter ceases to grow; the integuments are observed to encroach upon the fungus, which gradually contracts to a level with the scrotum, and the sore (for it now puts on the appearance of a common granulating sore) quickly cicatrizes in the usual manner.

It is instructive, in the attempt to understand a pathological principle, and to ascertain its correctness, to see how far analogy bears us out. In the above explanation of the fungous granulations from a scrofulous testicle, we are borne out by analogy; for we find that other examples of fungous granulations may be referred to the same cause, and may be remedied by the same means.

A common instance of fungus is seen at the side of the nail, after inflammation of the toe has terminated in abscess. As the inflammation subsides, a small sensitive fungus sprouts by the side of the nail, to which the surgeon applies caustic; it may happen that the part is benefited by the application, or, as is more frequently the case, the fungus continues to grow and remains painful, in spite of the attempt to restrain it. The cause of the fungus lies below the nail: as soon as a portion of the nail is removed, a deep unhealthy cavity is discovered, and when this is brought into a state of healthy granulation, the fungus shrinks, and the part heals.

The appearance of fungus around a

fistulous opening is known to indicate the presence of a piece of dead bone, or some condition of parts arising from a similar cause, that prevents the wound from healing. In diseases of bones and of joints, we see the orifice of a fistulous opening surrounded with a sprouting fungus, which the surgeon never thinks of destroying with caustic, knowing that its destruction will avail him nothing. The fungus is here an indication of the healthy condition of the parts at the orifice of the wound—of a disposition to granulate and heal the wound, if the deeper and surrounding parts could be brought to consent. This want of consentaneous action in the surrounding surface of the fistulous canal causes the granulations to fungate and become exuberant.

A similar state of parts is occasionally seen in a suppurating bubo, in a scrofulous constitution. In the centre of an extensive sore in the groin, a solitary gland may be sometimes seen rising above the level of the sore, covered with florid granulations, and strongly contrasting with the neighbouring unhealthy surface. Often, the gland is attempted to be destroyed by caustic, as forming the impediment to the healing of the ulcer: its healthy appearance is not able to save it from destruction; the surgeon finds the surface of the sore become healthier under the use of the caustic, and he perseveres, not aware that the benefit depends upon the caustic reaching the base of the gland, and thus improving the condition of the sore. If he directs his attention to the improvement of the unhealthy surface of the sore, and leaves untouched the granulating gland, he will find the parts cicatrize more quickly. The gland is the only part in a state of healthy action—it fungates, because the surrounding surface is incapable of producing healthy granulations; but as soon as these are made to appear, and are able to inosculate with the base of the gland, the latter no longer fungates, but sinks to a level with the integuments, and the sore quickly cicatrizes.

The modes of treatment usually resorted to for fungous granulations of the testicle are, castration, excision of the granulating mass, and pressure.

The first is justly abandoned in the present advanced state of surgical science, since it is known that a large portion of the gland remains healthy;

and that, if the part can be brought to cicatrize, the remaining portion of the gland retains its functional power.

The removal of the granulations by the knife is the plan most commonly employed; but unless the unsound integument be also removed, little is gained by the operation. The mere excision of the fungating mass would leave the disposition of parts but little improved; the fungus would again grow; and the same unsound condition of integuments remaining, it would be unable to inosculate with them. The operation, therefore, includes all the detached integument, and as much as will allow the edges to be brought in contact for the purpose of adhesion. The operation is generally completely successful, and I know but of two objections to it. When the fungus is small it may be so readily remedied without the knife that the operation is not required. When a large mass of fungus appears, and the opening in the integument is extensive, the testicle itself frequently protrudes from the aperture, and becomes endangered in levelling the fungus with the knife. In examining the fungus after its removal, a portion of the tubular structure of the gland is sometimes found to have been sliced off with the fungus.

Pressure, by means of straps of plaster, is occasionally successful; but in the majority of cases it is either so difficult of application, or produces so much irritation in the inflamed integuments of the scrotum, that the patient is unable to support it. I have frequently seen it fail in its object from the above causes.

The treatment which has been pursued in the case of Reid, you will generally find successful, if the mode of dressing be properly attended to. In this case the remedies depended upon are, mercurials in small doses, tonics, and a local application to promote a healthy condition of the sore at the base of the fungus. Mercurials, in very small doses, are beneficial in two ways; they diminish the disposition to fungate, and also induce a more healthy action in that part of the sore where it is most required. If combined with tonics, they can be borne even by constitutions in which mercury has been employed to excess. The most convenient form I find to be a combination of quinine and pilul. hydrarg. in doses regulated to the

powers of the constitution. The internal exhibition of mercury, however, is by no means indispensable; and when its action has already proved mischievous in a scrofulous habit, the local application may be substituted, in the form of the ung. hydr. nitric oxyd. or the same form of mineral in powder applied carefully to the edges of the sore and base of the fungus, where the action appears to be defective. The powder need not be applied over the whole fungus, as salivation is quickly induced when the surface happens to be extensive; the edges alone being dressed with the mercurial application, the other parts may be dressed with common simple dressing. Under this plan I have succeeded in reducing the largest protrusions of this nature. The cast which you now see is taken from the testicle of a man in whom this plan succeeded some years ago. To have removed the fungus with the knife, a considerable portion of the testicle would most probably have been sacrificed. A gentleman, who had taken mercury to great excess, brought on an enlargement of the testicle, which remained indolent and free from pain for many months. Excess in horse exercise brought the disease into an active state, and in a few weeks a fungus, as large as an egg, presented itself. Under the local application, and the exhibition of quinine with mineral acid, the part is rapidly improving.

I have perhaps given to the subject an importance to which it is not entitled. The triumph of surgery, however, can only be said to be complete when by our knowledge of pathology we are enabled to dispense with operations. The use of the knife should, from every motive, be dispensed with whenever it is possible to obtain our end as well by any other means. A principle is something more than a mere valuable fact; its application is so extensive, and a knowledge of it so useful in the practice of our profession, that I have thought our time well occupied in explaining the nature of fungous granulations.

ON THE DIAGNOSIS
OF
ANEURISMS OF THE AORTA,
BY
GENERAL AND STETHOSCOPIC SIGNS.

BY J. HOPE, M.D.

[Continued from page 358.]

THE investigations of M. Laennec on aneurism of the thoracic aorta, were limited* and inconclusive; accordingly, he remarks, "that, of all the severe lesions of the thoracic organs, three alone remain without pathognomonic signs to a practitioner expert in percussion and auscultation—namely, aneurism of the aorta, pericarditis, and concretions of blood in the heart previous to death."

On applying the cylinder, in two instances, to tumors presenting externally, he found that their pulsations were exactly isochronous with the pulse; that the shock and sound much exceeded those of the ventricles; that the beating was distinctly audible on the back, and that the auricular sound could not be distinguished at all. For the last reason he denominated these pulsations "simple," in contradistinction to those of the heart, which are double, in consequence of the alternate contraction of the auricles and ventricles. From the above cases he felt certain that, in some instances, pectoral aneurisms might be recognized by simple pulsations, usually much stronger than those of the heart; but he thought that, in a still larger proportion, the sign would fail; for the slightest dilatation of the heart renders its contractions audible over the whole sternum, and below the clavicles. The ventricular systole being synchronous with the pulsation of the aneurism, the two will be confounded together; while the auricular contraction, being audible on the tu-

* He met with only about thirty cases in which he suspected aneurism of the pectoral aorta: most of these left the hospital. In a very few (*quelques-uns*), moderate dilatation of the ascending aorta, or arch, indicated by the stethoscope, was ascertained by dissection. In two cases, in which an external prominence rendered the nature of the affection manifest, he took the opportunity of studying the signs, but he does not say that he examined the subjects. One aneurism of the descending aorta he dissected, but it had not afforded any stethoscopic signs which attracted his attention. An experience so limited is insufficient, even in the hands of M. Laennec, to decide a question of such difficulty as the diagnosis of pectoral aneurisms.

mor, will lead the auscultator to believe that he hears the beating of the heart.

As the auricular sound does not extend to the abdomen, M. Laennec found no difficulty in recognizing ventral aneurisms by the "*simple pulsation*."

Distinctive characteristics of the aneurismal pulsation.—According to my experience, the cylinder is scarcely less capable of affording decisive indications of pectoral than of ventral aneurism. It is unimportant whether the pulsations be "simple" or "double;" for, though double, they may, I believe, be discriminated from the beating of the heart by unequivocal characteristics—viz. the first sound, coinciding with the radial pulse, is invariably louder than the natural ventricular sound, and generally than the most considerable concomitant bellows-murmurs.

On exploring the aneurismal sound from its source towards the præcordial region, it is found to decrease progressively, until it either becomes totally inaudible or is lost in the predominance of the ventricular sound. Now, if the sound emanated from the heart alone, instead of decreasing it would increase on approximating towards the præcordial region.

The second sound actually does sustain this progressive augmentation, on advancing towards the heart; and as its nature and rhythm are found to be precisely similar to those of the auricles, it is distinctly recognised as the auricular sound. This second sound, therefore, corroborates, rather than invalidates, the evidence of aneurism afforded by the first; for, if both proceeded from the heart, both would sustain the same progressive changes of intensity on receding from it.

Another distinctive characteristic of the aneurismal pulsation is the peculiar nature of its *sound*. It is a deep, hoarse tone, of short duration, with an abrupt commencement and termination, and generally louder than the most considerable bellows-murmurs of the heart. It accurately resembles the rasping of a sounding-board, heard from a distance; whereas, the sound occasioned by valvular disease of the heart has more analogy to the bellows-murmur, being somewhat soft and prolonged, with a gradual swell and fall*.

The loudest aneurismal sound is occasioned by dilatation, and it has more of the grating or rasping character in proportion as the interior of the vessel is more overspread with hard and especially osseous asperities. When the dilatation is confined to the ascending aorta, the sound, impulse, and purring tremor, are stronger on the right than on the left side of the neck*. Old aneurisms, the parietes of which are thickened by fibrinous depositions, yield only a dull and remote sound. In all cases of dilatation, and in the majority of sacculated aneurisms, the sound is loudest above the clavicles, even though the impulse be stronger below. In some instances of the sacculated species it is louder on the side of the neck opposite to that where the tumor exists. I have found this to proceed from two causes—first, disease of the inner coat of the aorta, anterior to the tumor; secondly, the interposition of the sac, thickened with fibrinous layers, between the aorta and the superclavicular region, whence the source of sound was unusually remote on the side affected.

The sound of aneurisms is, in most instances, audible on the back; and when the tumor occupies the descending aorta, and is extended along the spine, it is often louder behind than on the breast. If, in the back, it possess the abrupt, rasping character, the evidence which it affords is almost positive; for the loudest sounds of the heart, when heard on the back, are so softened and subdued by distance as totally to lose their harshness.

above the clavicles, is attributable to its being reverberated through the chest before it arrives at the ear. This probability is countenanced by the following considerations:—1. That, in Case 9, although the sound was loud and hoarse above the right clavicle, yet it was merely a whizzing (sifflement) without hoarseness on the superior part of the sternum, where the dilated ascending aorta was in apposition with the bone, and where, consequently, the sound was transmitted immediately to the ear. 2. That in the heart, the proximity of which organ to the thoracic parietes is unfavourable to the expansion and reverberation of its sounds, the morbid murmurs are less hoarse and loud than those occasioned by pectoral aneurisms. 3. That, in aneurisms of the abdomen and extremities, where there can be little or no reverberation of sound, there is a still less degree of hoarseness and loudness.

The abruptness of the aneurismal sound, compared with the prolonged swelling character of the ventricular murmur, is owing to the latter being generated by a gradual muscular contraction, while the former is due to the sudden propulsion of a fluid through a tube naturally possessed of little elasticity, and rendered still more unyielding by disease.

* It appears probable that the superior hoarseness and loudness of the aneurismal sound, heard

* Vid. case 9.

Purring tremor is a third characteristic of the aneurismal pulsation. It is more considerable in simple dilatation than in sacculated aneurism, particularly if the former affection be accompanied with much asperity of the internal membrane. From numerous dissections, the fact appears to me to admit of the following explanation:—In cases of dilatation, the interior of the vessel is almost invariably rendered rugged by osseous, cartilaginous, or other adventitious depositions, and the blood, in permeating such a tube, necessarily occasions a strong tremor. In sacculated aneurism, though a portion of blood descends into the cavity, the greater quantity pursues a tranquil course through a smooth canal, and the tremor is proportionally inconsiderable.

I have uniformly found the purring tremor confined to the super-clavicular regions, except on the apex of an aneurism which had protruded through the ribs, and presented immediately beneath the integuments. It is rarely developed at all by old aneurisms; because, in consequence of their magnitude, and the thickening of their sacs with fibrinous coagula, they possess little susceptibility of vibration.

Purring tremor, proceeding from organic disease of the aorta, may easily be distinguished from that occasioned by nervous agitation. The former is constant, or may be excited at pleasure by accelerating the circulation: it is restricted to a limited space above the sternal extremities of the clavicles, and it is accompanied with the hoarse aneurismal sound. The latter is only occasional, occurring when there is an exacerbation of nervous restlessness: it extensively pervades the adjoining arteries, and the concomitant sound is comparatively soft and inconsiderable.

Pulsation attends every species of enlargement of the aorta. In cases of dilatation it exists only above the sternal ends of the clavicles, and always on both sides of the neck simultaneously; though, when the enlargement is confined to the ascending aorta, it is stronger on the right than on the left, as in case 9. When dilatation is of a bulging or pouched form, and of great magnitude, as in case 5, it may occasion pulsation under the sternum. Carotid and subclavian aneurisms only produce impulse, sound, and tremor on the side affected; and they may thus be easily

discriminated from aortic enlargements.

In cases of sacculated aneurism not seated very low in the chest, pulsation exists both above and below the clavicles, but it is generally stronger below, (vid. cases 7 and 8). When the tumor is large, and occupies the left extremity of the arch, the impulse is often perceptible from the sternum to the left shoulder, and as low down as the third or fourth rib. When it lies in contact with the ribs posteriorly, the shock is sometimes felt on the back, as in case 7. This, however, is a rare occurrence. A pulsation under the sternum or ribs is one of the least ambiguous signs of sacculated aneurism.

Recapitulation of the Stethoscopic, in conjunction with the general Signs of Aortic Aneurisms.

Simple Dilatation of the arch.—Its stethoscopic signs are—

1. A constant pulsation above both clavicles at their sternal ends; stronger on the right side if the enlargement is confined to the ascending portion; and never communicated to the sternum or ribs unless the dilatation be enormous, and of a pouched form.

2. A hoarse rasping sound above both clavicles, of brief duration, commencing and terminating abruptly: louder on the right side, if the enlargement is confined to the ascending portion: usually distinct on the back, where the ventricular sound, if audible at all, is very obscure.

3. A purring tremor above the clavicles, but never below. It is stronger, and the concomitant sound is more grating, in proportion as the interior of the aorta is more overspread with hard, and especially osseous inequalities.

General Signs of Dilatation.—Usually none. When any exist, they are a slight degree of those common to all organic diseases of the heart. They assume a most aggravated aspect when dilatation becomes complicated with organic disease of the heart.

Sacculated Aneurism.

Stethoscopic Signs.—1. A pulsation both above and below the clavicles, but usually stronger below. If the tumor occupies the ascending aorta, its impulse is most perceptible on the sternum. If it is seated in the arch, or commencement of the descent, the shock inclines to the left side, and sometimes reaches

to the shoulder. It is occasionally perceptible on the back, as in case 7. The pulsation anteriorly is always stronger on the tumor than at some point intermediate between it and the heart, and generally stronger than the impulse of the heart itself.

2. The aneurismal sound described under dilatation, but weaker. In large old aneurisms it has a dull and remote character, and is sometimes louder on the side of the neck opposite to that where the tumor exists. It is generally audible on the back; and, when the tumor occupies the descending aorta, it is often louder behind than in front. If, on the back, it has more of the abrupt rasping sound than the ventricular systole in the præcordial region, the evidence is almost positive.

3. A purring tremor above the clavicles, and never below, unless the tumor has penetrated through the ribs or sternum. It is weaker than in dilatation, and in old and large aneurisms often becomes extinct.

General Signs of Sacculated Aneurism.—A pulsating tumor, presenting externally, and sooner or later causing livid redness of the integuments, and deficient resonance on percussion. A sense of retraction of the trachea, with wheezing respiration, and croaking or whispering voice. Dysphagia.—An intense gnawing or boring pain in the spine; aching of the left shoulder, scapula, neck, axilla, and arm, with numbness, formication, and impaired motive power of the limb. A sense of weight and infarction in the chest. Difference of the two pulses. Purring tremor of the radials. More or less of the ordinary symptoms of organic disease of the heart.

Sources of Fallacy, and the Methods of detecting them.

Pulsation beneath the sternum and ribs, occasioned by amplified glands, or other tumors in the anterior mediastinum, by hydropericardium, by enlarged heart, or, finally, by adhesion of the pericardium, may, according to my experience, be easily discriminated from aneurismal pulsation by the following criteria:—

Pulsating glands, or other tumors in the anterior mediastinum, are not attended with the aneurismal sound; and symptoms of a disturbed circulation

either do not exist at all, or they do not correspond in severity with the magnitude of the apparent disease.

Hydropericardium, instead of producing the gradual, steady, and powerful heave of an aneurism, occasions an undulating motion, of which some of the shocks are stronger than others, and none are exactly synchronous with the ventricular systole. The motion is equally diffused over every part of the space occupied by the fluid; whereas, in aneurism the impulse is notably stronger on the tumor and on the heart than in the intermediate space. Hydropericardium is not productive of the aneurismal sound. Its history is different from that of aneurism, the latter being very often referred to some injury or excessive exertion, suddenly followed by pain and dyspnoea, (vid. cases 6 and 8).

An Enlarged Heart causes a pulsation over a preternatural extent in every direction; an aneurism occasions it in its own direction alone. The beating of an enlarged heart is strongest at the point nearest to the centre of motion, and it decreases progressively on receding from it: that of an aneurism is stronger on the tumor than at some point intermediate between it and the heart; and in most instances it is stronger even than the beating of the heart itself. Hence an aneurism distinctly conveys the impression of two centres of motion—the tumor and the heart; while the pulsation of an enlarged heart is felt to be referable to one alone. Finally, the ventricular contraction of a dilated heart produces a loud flapping sound, and is not attended with aneurismal murmur, or pulsation above the clavicles.

I have never known adhesion of the pericardium to occasion a pulsation which could be mistaken for an aneurism until it had occasioned dilatation of the heart, its ordinary consequence. In this case the diagnostic symptoms are the same as those of enlargement of the heart, with one difference, that the motion is of a more unsteady, undulating, or struggling character.

Varix of the jugular vein, occasioning pulsation above the clavicle, is distinguished by the absence of sound, the compressibility of the tumor, and the languor of the impulse.

Enlarged glands, or other tumors

above the clavicles, receiving pulsation from a subjacent artery, rarely occasion sound, and if any exists it is a feeble whizzing. Both it and the pulsation are confined to the side affected.

If the tumor can be grasped, it will be felt not to dilate laterally during the ventricular contraction; and if it can be raised from the subjacent artery, its beating will cease entirely.

Subclavian and carotid aneurism occasion pulsation, sound and purring tremor only on the side affected, and these signs are more superficial and distinct than in aneurism of the aorta. The sound resembles that of the small hand-bellows, instead of having the hoarseness of the forge-bellows.

Purring tremor of the chest, proceeding from mucous rattle, may be recognized by its ceasing when respiration is suspended.

Abdominal Aneurisms

are comparatively so easy of detection that I have not thought it necessary to enter into detail respecting them.

Stethoscopic Signs.—1. A constant pulsation, of extraordinary power. It appears much stronger to the ear resting on the stethoscope than to the hand. The instrument may be forced down in various directions into close proximity with the tumor, and an idea of its position and dimensions may be thus obtained.

2. A loud, brief, and abrupt bellows-sound, not so hoarse as that of aneurisms in the chest. It is sometimes audible on the back. The auricular sound is inaudible, and consequently the pulsation is "simple."

General Signs.—They are those of impeded respiration; of lumbar abscess, with or without caries of the vertebræ; of renal disease; or of pressure on the nerves or viscera of the abdomen and pelvis; but none are characteristic of aneurism except a pulsating, and usually compressible, or fluctuating tumor, felt through the abdominal parietes.

Sources of Fallacy.

A *scirrhus tumor* of the stomach receiving the pulsation of the aorta, and occasioning sound by its pressure on that vessel.

It may be discriminated by the impulse being comparatively feeble, particularly when the stethoscope is applied

laterally; by the sound being only a feeble whizzing; by the superficial and incompressible feel of the tumor; by its moving when the stomach is distended; and by the presence of symptoms indicating scirrhus and dyspepsia, rather than of those denoting derangement of the circulation.

Enlargement of the pancreas by hydatids or scirrhus.—An extremely rare disease.

Fungoid tumors of the mesentery, omentum, or transverse arch of the colon.

All these affections may be discriminated from aneurism, either by the total absence of sound and pulsation, or by the same peculiarities in these signs as characterize scirrhus tumors of the stomach. The general symptoms are those of slow and progressive marcor, without disturbed circulation.

Nervous Pulsation of the Aorta.—This is a very frequent and deceptive affection in irritable and hysterical constitutions. When it exists in conjunction with air pent up in the colon or duodenum, and presenting the feel of a compressible tumor, the resemblance to aneurism is still more complete.

After an examination of many cases, I believe that attention to the following circumstances will render the diagnosis easy.

The cylinder may be pressed down on the aorta, so as to yield a distinct feel of the vessel of its natural calibre. The sphere of its pulsation is limited transversely, but extensive longitudinally, being usually more or less perceptible from the epigastrium to the bifurcation. The impulse, instead of being the gradual, steady, and irresistible heaving of an aneurism, is a smart though vigorous jirk; and the sound, when any exists, is merely a whizzing, almost devoid of hoarseness. The general symptoms are nervous or hysterical, and the pulsation is of an inconstant character, increasing or diminishing with the exacerbations or remissions of the constitutional perturbation.

Case 10 presents a good exemplification of this complaint.

[To be continued.]

DIABETES.

To the Editor of the London Medical Gazette.

Hull, 17th August, 1829.

SIR,

THE enclosed is a case of the diabetes mellitus, in the treatment of which I had recourse to the hydro-sulphuret of ammonia, on the principles laid down by Dr. Rollo, with decided benefit. My object in transmitting it to your Journal (if you think it worthy of a place there) is in the hope that it may draw the attention of the medical world to a remedy which, I think, has undeservedly been too much neglected. In no case of the disease that has hitherto come under my observation have I seen so regular and steady a diminution of the urinary secretion, with such marked improvement in the general health and strength, as the one under consideration. I have only to regret that a flagrant act of irregularity on the part of the patient prevented us from witnessing the termination of the case.—I have the honour to remain, Sir,

Your obedient servant,
M. CHALMERS, M.D.

GENERAL INFIRMARY, KINGSTON-UPON-HULL*.

MICHAEL SNELL, 36 years of age, a labourer, from the fenny parts of Lincolnshire, a stout, broad-chested, muscular man, was admitted into this Infirmary on the 7th of May last, labouring under all the well-marked symptoms of this untractable disease. He passed saccharine urine, to the extent of twenty-eight pints in twenty-four hours; it was of a pale straw colour. His thirst was insatiable; appetite great. There was wasting of the body, and extreme debility. Pulse quick; skin dry and rough; heat of surface more than natural; tongue white, with the fauces constantly dry and clammy, and the breath with the peculiar diabetic odour. Bowels very costive. There was a feeling of weight and uneasiness in the region of the kidneys, but not amounting to pain. The epigastric region was much distended, but he suffered no pain on pressure in this quarter. He had enjoyed good health until about two months before his admission into this Infirmary. He imputes the disease to having drank large quantities of cold water while engaged in some laborious employment in Lincolnshire.

* The Printer having mistaken this for one of the Hospital Reports, put it in the small type of that department.

He was cupped over the loins on the day of his admission, and about ten ounces of blood abstracted. He had a warm bath in the evening, and 15 grains of Dover's powder, with two of calomel, at bed-time; and he was ordered 3i. of the compound jalap powders in the morning, and to have the common diet of the house.

May 9th.—Thirst very urgent, so as to prevent him from sleeping during the night. Bowels well opened by the powder he took yesterday morning. Urine about twenty-six pints. Uneasiness in the region of the kidneys relieved by the cupping. Skin dry as before. Did not perspire after the bath. A quarter of a grain of the tartarized antimony, in an ounce of water, was prescribed every two hours; a grain of opium at bed-time; a pound of lime-water, with an equal quantity of milk, daily; and the region of the kidneys to be rubbed twice a-day with the ointment of the tartarized antimony.

May 13th.—No alteration in the symptoms; the quantity of urine the same as on the 9th. The solution of the tartar emetic and the opium were stopped, and a mixture containing thirty drops of the hydro-sulphuret of ammonia and six ounces of water, an ounce to be taken three times a-day, was prescribed. To have animal food twice a-day.

May 15th.—Urine twenty pints. Drink eighteen pints. Complains of slight nausea from the mixture.

From this time until the 25th of May the urine continued to diminish, as will be seen by the annexed table. The bowels during this period were kept regular by the occasional use of a pill containing two grains of calomel, four of colocynth, and one drop of the croton oil. On the 28th of May the dose of the hydro-sulphuret was increased to twenty drops in the day.

30th May.—Had a warm bath.

3d June.—Urine fourteen pints. Appetite and thirst not so great. Perspired freely after the bath. Skin moist; bowels open from the use of the pills. Thinks himself stronger, and looks better. The mixture was continued, the dose of the hydro-sulphuret being augmented to thirty drops in the day.

From this period until the 29th of July he continued daily to improve in health and strength, and he became much more active in his habits. The healthy function of the skin was restored. The appetite and thirst were nearly natural, while the secretion of urine had steadily diminished to seven pints in the twenty-four hours; it was decidedly less saccharine in its taste and smell. The peculiar diabetic odour of the breath had also much diminished. At this time, when there was every reasonable hope of a favourable termination of the case, he was dismissed the hospital for irregularity.

TABLE of the DRINK and URINE of MICHAEL SNELL, from the 15th of MAY to the 28th of JULY, 1829.

Date.	Drink.	Urine.	Date.	Drink.	Urine.	Date.	Drink.	Urine.
	Pints.	Pints.		Pints.	Pints.		Pints.	Pints.
May 15...	18	20	June 9...	14	14	July 4...	10	10
16...	18	20	10...	14	14	5...	10	10
17...	15	16	11...	14	14	6...	9	9
18...	12	12	12...	13	13	7...	9	9
19...	13	14	13...	13	13	8...	9	9
20...	16	17	14...	13	13	9...	9	9
21...	16	18	15...	13	13	10...	9	9
22...	16	18	16...	13	13	11...	9	9
23...	16	16	17...	12	12	12...	9	9
24...	15	15	18...	12	12	13...	9	9
25...	16	16	19...	12	12	14...	9	9
26...	16	16	20...	12	12	15...	8	8
27...	16	16	21...	12	12	16...	8	8
28...	16	16	22...	12	12	17...	8	8
29...	15	15	23 ..	11	11	18...	8	8
30...	...	...	24...	11	11	19...	8	8
31...	...	...	25...	11	11	20...	8	8
June 1...	15	15	26...	11	11	21...	8	8
2...	15	15	27...	11	11	22...	8	8
3...	14	14	28...	11	11	23...	8	8
4 ..	14	14	29...	10	10	24...	7	7
5...	14	14	30...	10	10	25...	7	7
6...	15	15	July 1...	10	10	26...	7	7
7...	15	15	2...	10	10	27...	7	7
8...	15	15	3...	10	10	28 ..	7	7

EFFICACY OF COLCHICUM SEEDS IN RHEUMATISM AND GOUT.

To the Editors of the London Medical Gazette.

GENTLEMEN,

HAVING observed that the efficacy of colchicum, as a specific in rheumatism and gout, has of late been much questioned, and having seen, with regret, that the remedy is less frequently appealed to, I may be permitted, perhaps, through the medium of your publication, to offer a few remarks on the subject, with a view to prove that the medicine is "more sinned against than sinning;" inasmuch as a want of attention to the variable nature of its preparations has been productive of the discredit it has acquired.

The preparation usually employed is the vinum colchici, or a tincture made from the root; but the properties of the root vary with the season: thus, in summer it is highly acrid, in autumn nearly inert; and as it may be (and pro-

bably is) gathered at all times, without reference to quality or efficacy, so we must necessarily have a medicine on which little reliance can be placed: and, independent of this objection, it is far less efficacious than a tincture made from the seed. I have frequently seen 3j. of the former ordered for a patient in St. Bartholomew's Hospital, not only without benefit but without any sensible effect; but, I take it, if a practitioner were to prescribe a similar quantum of the latter, he would gladly enter into a compromise, and admit its power, rather than repeat the dose; and the patient would be fortunate, indeed, if he did not suffer severely from vomiting or purging—perhaps from both. If the colchicum be properly prepared and properly administered, it will yield to no medicine in certainty of effect, in power, or in usefulness.

It is true there is a formula in the Pharmacopœia termed spiritus colchici ammoniatus, in which the seed is ordered to be used: but the stimulating nature of the menstruum must, in many cases, render the preparation objectionable.

Many practitioners are wont to combine *magnesia* with colchicum; and it is worthy of remark that the active principle of the plant (*viz.* *veratria*) is immediately precipitated; so that the action of the remedy in the formula alluded to may be materially modified by the nature of its solvent.

It should be borne in mind, too, that this medicine, whether exhibited in substance or in its Pharmacopœial preparations, must produce some manifest impression on the stomach and bowels ere its remedial virtues can be depended on; and if nausea, vomiting, or purging, are elicited, we may calculate with as much certainty on removal of the disease as on the establishment of salivation by the continued employment of mercury.

In a work published in 1820, "On the Use of Colchicum Autumnale in Inflammatory Diseases," by C. T. Haden, surgeon to the Chelsea and Brompton Dispensary, the author observes, "in all cases, great attention is required to ascertain the proper dose: if relief be not apparent in ten or twelve hours, it must be increased, and calomel, or the black dose, be given in addition, so as to bring on the purging sooner. Its effects are so certain, that a long case with me is quite a rarity, and only occurs when the patient is not seen early in the disease—*seldom then.*" Mr. Haden remarks, too, in allusion to his father's practice, "whose experience in the use of colchicum was very extensive," that "he had, for more than six years, employed a combination of powdered colchicum and opening medicine (*sulphas potassæ*) as his common prescription." Mr. H. seems to have been perfectly aware that the tincture made from the root could not be depended on, since he writes of the powder, that, "in several cases, sickness and purging warned him to omit the medicine, but then the leading symptoms of the disease were generally *by that time removed*; which cannot be said in all cases where sickness follows the use of the tincture. As neither bleeding nor purging will remove inflammatory complaints, if attention be not paid to the diet and other collateral requisites of a successful medical treatment, so the same attention is requisite during the exhibition of the colchicum; and it is the more useful to press this point, because it frequently happens that a good remedy is brought into disrepute by a supposed failure,

when the failure has arisen from inattention to such collateral circumstances as are alluded to above."

In a paper published in the Medical and Physical Journal (I think in October 1819), Mr. Thompson proved that different specimens of the root vary much in their medicinal qualities, according as they are gathered at different seasons of the year, and according to the mode of preservation. He thought that the bulb arrives at its greatest maturity in July, or the early part of August; consequently that then, and then only, ought it to be gathered. He thought, too, that drying the bulb at a higher temperature than that of air, tends materially to dissipate the active principle on which its efficacy depends.

After Mr. Thompson's paper appeared, several writers took the field on the same subject, each assuming a different position with regard to the best season for gathering, or the best mode of preparation, and each, therefore, affording additional evidence of the slender reliance that could be placed on the medicine. Mr. Battley, for instance (no mean authority, by-the-by), objected to Mr. Thompson's method of drying, and broadly advocated the propriety of slicing the bulb, immediately on its being gathered, and drying it at a temperature of 170 degrees. Some authors asserted that *in spring* the plant is most active, others *in autumn*; some were confident that it possesses no efficacy in spring, others that its virtue yielded if permitted to grow till autumn.

But my object in this paper is to direct the attention of the profession to the vast superiority of the tinct. semen. colchici. Dr. Williams, of Ipswich, was, I believe, the first who employed it, and his experience is stated to be "very satisfactory, and to merit every attention;" though I am not aware that the said "experience" was by himself made public.

The tincture is readily prepared by macerating two ounces of the seed in one pint of pure spirit for the usual time. Its dose will be about m 36 or 40, with or without an aperient. In the latter dose it will rarely fail to produce nausea, vomiting, or purging, and, in about twenty-four hours, it will seldom, if ever, fail to make a decided impression on the disease; but it is to be recollected that the effects alluded to must be established. I think, however,

that in two or three cases I have seen the disease yield on the medicine increasing the secretion from the kidneys, or from the skin, without any vomiting or purging having taken place. This is a circumstance worth attending to, but I advance it merely on my own *threadbare* authority; and I trust these observations will be taken “*cum grano salis*,” and as mere hints, intended to excite the profession to draw its own deductions on a cautious investigation of the subject.

Many practitioners have timidly rejected the colchicum without even affording it a single trial; and this from a belief that the accession of vomiting, &c. would be attended with serious consequences. Such, however, is far from being a fact, unless the medicine be administered in immoderate doses. The symptoms produced by the use of $m4$), if distressing, which can rarely be the case, are readily controlable by a few drops of laudanum. Still, however, (to adopt the language of Mr. Haden,) “the remedy is unquestionably a powerful one, and is not to be played with; it is not a weapon to be wielded by unskilful hands without danger. Like the lancet, if used improperly, or pushed too far, it will bring with it regret and disappointment; but, like the lancet, it will repay him who uses it skilfully, with caution, and moderation.”

With regard to the powder, it is evident that it must be open to the same objections as the common tincture, and even Mr. Haden, who highly extols it, observed that great caution was necessary in its mode of preparation, to secure success. I have seen it exhibited without benefit; and I have seen the tincture of the root so often fail, that I feel it to be a duty to offer the three following cases, as some proof that both the substance and its deputy must yield the palm to the tincture of the seed. One of the cases, at least, may be interesting, since it is “drawn up” by a member of the profession, who has himself bent beneath rheumatic sway, and who has personally felt the specific power of the preparation alluded to.

CASE I.—My Dear Sir,—According to your request, I send you the particulars of my own case, together with the result of my practice, as it regards the efficacy of the tincture of semen colchicum.

In the spring of 1828, after an expo-

sure to cold, I was seized with an attack of acute rheumatism, which became so severe as to deprive me of motion and to compel me to keep my bed. After taking the usual remedies, *ex. gr.* sudorifics, calomel, opium, &c. together with the *vin. rad. colch.* without receiving the slightest remission of pain, I was induced by your recommendation to try the *vin. sem. colch.*

I commenced with thirty drops every four hours. After the fourth dose, a most distressing nausea and diarrhœa were produced. As soon as this effect took place, the torture, which had been constant and almost unbearable, was completely lulled, and I was surprised to find that I could move with very little inconvenience and with scarcely any pain. The following day, nothing remained of the complaint but the stiffness and weakness consequent on confinement. The benefit derived was so immediate and positive, that I resolved on giving the preparation a fair trial. I have since administered it in upwards of fifty cases, and have, in most of them, obtained the same result. I do not mean to assert that it is a complete panacea, but I can confidently state that eight cases out of ten will be cured by it. In some few cases it seems to produce little permanent benefit, though in these it affords evident relief. I have since recommended the preparation to several of my friends, who likewise give their testimony in its favor.

I am, sir, yours very truly,

10th Aug. 1829.

J. G. Evans, Esq.

CASE II.—Mrs. B. the wife of a butcher, residing at Brixton, was attacked in the spring of the past year by rheumatic gout. To this malady she had been subject upwards of twenty years. It generally paid her two visits annually—visits as unceremonious in their approach as they were lengthy in duration, each confining her to the bed for the average period of six weeks, and each leaving a notice with the constitution that it had been drawn upon too largely. At the time adverted to, I was asked to see her, and found the poor creature writhing in the greatest agony, with the phalanges of the fingers flexed at right angles, and the motion of every joint of the body more or less influenced by the deposition of earthy concretions. Having ascertained that she had tried

nearly every article in the *Materia Medica**, and had given the Ollapodian doctrine (of pacing through the alphabet from A to Z) a full trial, I merely prescribed—

Rx Vin. Semen. Colch. m_{xxx} . Aquæ \mathfrak{z}_{ss} .
Fiat haustus, 6ta quaque hora sum.

In about thirty-six hours I repeated my visit, and found the patient not only considerably improved, but according to her own phraseology, “actually in heaven.” Not a vestige of pain remained; and she told me, that soon after taking the second dose (when vomiting and purging took place) she was sensible of much diminution of suffering; that the abatement was gradual and remarkable; and that the thirtieth hour from the beginning of the treatment saw her without a single joint affected. The vomiting† and purging, which had been amusing the patient pretty actively, were now arrested by the omission of the colchicum, and the *commission* of a little opium; and the turbulent stomach and bowels having been reduced to perfect obedience, she was directed, for a day or two, to take merely the simple saline draught every four hours. The universal earthy deposit strongly evidenced a more than common rheumatic and gouty diathesis, and, with a view to lessen the *affection* of the system for these maladies, I kept it gently influenced by the colchicum for eight or ten days. At the end of this period, the rigid fingers had to my surprise regained somewhat of their wonted power, the size of the joints had diminished, and she, who for years had been quite unable to use a knife and fork, now took a pin from her dress with the greatest ease. Mrs. B. has had two or three attacks since the time above spoken of, but they have been as readily controlled; and I am really afraid to state the terms in which the old lady (for she is about 70) speaks of her medicine.

CASE III.—M. H. a coachman, had in April an attack of acute rheumatism; he had suffered from the disease fre-

quently before, and it had usually confined him to the room, if not to the bed, for three or four weeks: he had always taken medicine during each attack, but of its nature he could give no account. On the last visitation, however, (viz. that in April) the Tr. Rad. Colch. was early exhibited in doses of m_{40} and $\mathfrak{z}j$. both with and without laxative medicine. For ten days was the preparation unremittingly employed, and the tenth day found the patient “in statu quo.” No evident action had been produced on the stomach or bowels, skin or kidneys; not even the slightest nausea had been elicited. It was now obvious enough that the tincture of the root was about equal in strength to its quantity of water, and therefore a trial of the tincture of the seed was determined upon. The man took three doses, of 30 minims each: purging came on, and the pain went off. In thirty-six hours he was free from all uneasiness, and able to eat a hearty meal.

Ere I close this paper, the following case may be offered, as illustrative of the *power* possessed by the remedy in question over the circulating system:—

Mrs. C. aged 40, of a healthy constitution, received a violent cold four years since, in journeying with her husband to a village a few miles from the metropolis. An attack of acute rheumatism soon established itself, which gradually fell into the chronic stage, and she has been a martyr to the disease up to the present period; the elbows, wrists, knees, and ankles, being all affected. Almost every method of treatment having been adopted with little or no success, she was directed a short time since to take m_{xxx} . of the Tr. Sem. Colchici, *ter die*. She took the prescribed dose for two or three days without any amendment; and then, for the purpose, as she expressed herself, “of getting rid of her torments more quicker,” she doubled the dose, or, at least, took much more than her instructions warranted; the consequence was, the super-vention of retching and purging to a violent degree. These having continued for twenty-four hours, she thought it prudent to send for her medical attendant, who prescribed an opiate, and directed her to omit the medicine. This mandate was misunderstood, and the patient still took her Herculean doses. The opiate relieved the urgent symptoms for a few hours, but they recurred

* The Vinum Colchici having had its “full share of practice.”

† If *vomiting* strictly means an ejection of the contents of the stomach, the words retching would be here more applicable. The usual effect produced by the colchicum is a frequent *urging* or retching; the medicine itself is rarely returned, and at the utmost we may have a little frothy mucus.

with increased violence. Twenty-four hours or more had elapsed from this second accession when I saw her; the bowels were then acting every few minutes, and the retching was not less active. Scarcely any pulse could be felt at the wrist; the extremities were cold, and bathed in a clammy perspiration. It was quite evident that no time was to be lost; and having made the attendants and the patient herself *understand* that the medicine must be omitted, she was ordered two table-spoonfuls of brandy and an effervescing draught, with Liq. Opii Sedat. $\mathfrak{m}\text{x}$. every three hours: a starch enema, with Tr. Opii $\mathfrak{m}40$ to be injected immediately. In a few hours the pulse rose, and both purging and vomiting ceased. The patient has nearly recovered; but what effect the remedy (which has, at least, had the benefit of a full trial) may have on the rheumatism, remains to be seen.

The Tr. Semen. Colchici is kept by Pope, in Oxford-Street; Lowe and Johnson, 30, Bishopsgate-Street; and Harvey, 63, Great Surrey-Street, Blackfriars.—I have the honour to be, Gentlemen, with much respect,

Your obedient servant,

J. G. EVANS.

18, Finsbury-Place South, Finsbury-Square,
August 15th, 1829.

MEDICAL ADVICE TO TRAVELLERS IN THE EAST.

By R. MADDEN, Esq.

Thebes, July 16, 1826.

THE fatal influence of an eastern climate on European constitutions, on those of English travellers more especially, it is melancholy to observe; and few weeks pass over without swelling the history of ill-starred enterprise with some new deaths to supersede the less recent obituary in which are found the names of Bowden, Burckhardt, and Belzoni; and seeing, as I have done for some years past, many Europeans falling victims to their own imprudence, rather than to the unavoidable malignity of any particular disease, I am induced to say a few words on the preservation of health in these countries, and to lay down some rules for the African traveller, suggested by the mortality around me, and

confirmed by sad acquaintance with many of the “ills the flesh is heir to” in the eastern world.

The dysentery of Egypt is very different in its malignity from that of England, and the intermittent of Alexandria or Cyprus from the Lancashire ague; and were we to trust here to the same quantity of calomel in the one, and quinine in the other, which suffice to cure either of these maladies at home, we should be woefully mistaken. The consideration of this subject, in however summary a manner, is of general, even more than medical, interest; inasmuch as its object is to warn the traveller of those dangers which have overtaken his predecessors, and caused the failure of so many African expeditions.

In Dr. Johnson's inestimable treatise on the Diseases of Hot Climates, it is said that the constitution of man is better adapted to bear those changes of climate experienced in migrating from a northern to a tropical climate, than that of any other animal; but that it is to the ingenuity of his mind, rather than to the pliability of his body, that he is indebted for that privilege. By accommodating his apparel to every temperature, he can defend himself from the excess of heat and cold, and by conforming his regimen to every alteration in his temperament, he can obviate the influence of climate, however great may be the transition. The inhabitants of hot countries migrate to cold climates with less impunity than we do to tropical ones: in Candia, I have seen hundreds of poor Arabs sink from the severity of a winter which to me appeared milder than our spring; in Alexandria, I have likewise seen whole troops of negro soldiers carried off with a few days' sickness from the effects of cold. In this mortality, however, moral depressing causes had much to do: the Arab had no resource within himself to resist a hardship of which he had no previous knowledge; the negro had no moral courage to invigorate or revive him when the change of climate made him sick, or the seabreeze made him shiver; and nothing but the strong exertion of mental energy can counteract the ill effects of a vicissitude of climate on the feeble frame of man.

I lay particular stress on the necessity in hot climates of invigorating the physical powers by means of the moral; or

in other words, of resisting the enervating influence of a hot climate by the excitement of enthusiasm—of counteracting its depressing tendency by the encouragement of cheerfulness—and, above all, by encountering its perils with a fearless heart. These will do more to preserve the traveller from disease than all the prophylactics of Currie or of Moseley. In my own practice amongst Europeans, I have had painful experience of the fatal effects of mental exhaustion, of irritability of temper, and of timidity of spirit. But too often to banish care the bottle and the bowl are had recourse to, as if energy depended on temporary excitement, and vigour on a stimulus which is succeeded by exhaustion. All the English artisans, who first entered the service of Mahomed Ali, have fallen victims to the climate, or rather to their intemperance; I attended one a few days ago, who died of delirium tremens induced by excess. Travellers may not carry intemperance to this extent; but they generally wish to live as they did at home, to eat the same quantity of food, to drink the same quantity of wine, to have their beef-steak as much underdone, their bottled porter as highly up, and their sauces even more than ordinarily *picquant*; but they must learn that, what is moderation in a cold climate, is intemperance in a hot one. They must not look to India for a mode of living worthy of imitation, nor deceive themselves with the idea that currie and sangaree are peculiarly adapted to a debilitated stomach. They must remember that they have exchanged a temperature of 54° or 56° of Fahrenheit for one of 100° in the shade, or even more, and which exceeds that of their blood in the sun. That the only means of carrying off the excess of heat is by perspiration; and that whatever through the alimentary canal tends to stimulate the skin beyond a certain point ends in relaxation; and that whatever external chill paralyses its functions, lays the foundation of those maladies which are the scourge of travellers, but from which the natives are generally exempt.

The people of India suffer not from diseased liver. The Egyptians very seldom are attacked with bilious remittent fever; and dysentery is by no means common amongst the Arabs. In fact, the diseases from which we suffer in the

east are attributable, in most cases, to our own excesses. In all warm climates the digestion of strangers becomes more or less impaired; the tone of the stomach, as well as of the whole system, is relaxed. It is in vain to seek to invigorate it by stimulants, or to restore strength by the most nutritious diet: the digestion is now unequal to it, and the quantity of animal food should be considerably decreased.

But not only are the functions of digestion disturbed in hot countries, but the quality of animal food is so indifferent as to add to that disturbance. Mutton is particularly bad in Egypt, and beef is generally so hard and coarse as to be little suited to an impaired digestion. Rice forms the best article of diet in hot countries; made into pilaw, it is sufficiently palatable, and seldom or never lies heavy on the stomach. What constitutes the food of all the people of the east is likely to be best adapted to their wants: national usages are seldom preposterous, and our countrymen are but too much in the habit of treating every thing to which they are unaccustomed with contempt. Where a Frenchman makes a point of accommodating himself to circumstances, an Englishman expects circumstances to accommodate themselves to him. National customs are to him prejudices he is ever ready to oppose, and national prejudices are errors he feels constantly called upon to contend with.

The oriental costume is decidedly best adapted to the climate. The turban and the ceinture are wisely considered by the natives to be essential to health, in keeping those parts warm which Europeans foolishly imagine they can never keep too cool. In Damascus, they make for shirting a sort of silk crape, which answers for a warm climate better than either cotton or linen. The traveller should be well provided with this material; and he would do well to remember, that clean linen and a clear conscience have been considered by a celebrated author, as the great essentials of a traveller and a Christian.

In the Desert there is no water to spare for washing, but the hot sand and the burning sun answer the purpose well enough: every day at noon when the caravan reposes, the traveller should spread the linen he wore the day before on the sand, and leave it there

exposed to the sun for a couple of hours; that period will be quite sufficient to destroy a legion of cutaneous tormentors. The lizard is the only creature I know which can resist the burning rays of the sun on the sands of the Desert.

Some travellers immediately after their day's journey are in the habit of washing their feet in cold water; there cannot be a more dangerous practice; perspiration is thereby checked, and the revulsion is frequently attended by fever in a very few hours. The vapour bath, wherever it can be procured the day after a fatiguing journey, is not only refreshing, but allays the excitement which destroys repose for many nights after a weary ride. As a general rule, the traveller will do well to avoid the cold bath altogether in the east; at all events, when the temperature is above 70°, it never should be employed. He may lay it to his account, notwithstanding every precaution, to be sometimes surprised by an attack of feverishness, during his journey; but there is nothing in it to excite alarm, if he only act with prudence. A throbbing temple, a bloodshot eye, a flushed cheek, a parched mouth, and a squeamish stomach, are sometimes to be expected from fatigue, and a long exposure to the sun; and a rational mode of treatment, in the generality of cases, removes every symptom in a single night; which, when aggravated by injudicious means, commonly terminate in inflammatory fever, dysentery, or biliary obstructions.

On the first seizure, the patient should bathe his feet in hot water, take three or four papers of James's powder, of three grains each, in the course of the night, drink plentifully of tepid rice water; next morning take an aperient of a strong infusion of tamarinds, and that day, at least, abstain from all solid food, and from animal food so long as any feverishness remains. Effective aperients are indispensable, so long as the symptoms are urgent; but saline purgatives I am no advocate for in this climate, where the intestines are so liable to irritation from the slightest causes; I am sure I have seen them do mischief frequently.

One great error of our travellers is the belief that while they are undergoing fatigue, they require more food than at any other time: nothing can be more

fatal than this very common mistake: the feverishness which attends fatigue deprives the stomach of its tone, and digestion is then a labour which it is unequal to perform; the individual feels exhausted, and forces himself, "to support his strength," to eat what he loathes to look on. I have seen the bad effects of this vulgar error very frequently, and heard injudicious people press the weary to whet their appetites with rum or *rakee*, when a few hours' repose would have restored the system, and given new tone to the stomach.

When the traveller is actually *en route* he should be more abstemious than usual; and whatever he eats should be of the plainest kind: when he halts for the night, he should repose a couple of hours before his meal, and it is only after sunset he should indulge in his libations, albeit they consist in spring water. He will observe that the Arabs in the Desert seldom or never drink during the day, and imitate in some sort the economy of their camels, in laying in a stock of water over night. When exposed to the burning sun of the Desert, the more a man drinks the more frequent his desire to allay his thirst; and the more peril he encounters from obstructing insensible perspiration.

In its wholesome properties, I believe the water of the Nile exceeds that of any other river in the world. Even when turbid, as at its rise, and depositing a sediment in a tumbler, in thickness an eighth of an inch at least, and alive with animalculæ, visible to the naked eye, even then it loses none of its salubrious qualities; but, on the contrary, by its gentle action as an aperient, it benefits health. Strangers are generally apprehensive of drinking such water; but they have no ill effects to fear from any quantity of these animalculæ: the gastric juice destroys them probably in a very few minutes.

I would recommend every one who purposes to visit Egypt and Arabia, to acquire a little general knowledge of medicine, and to be acquainted with the use of the lancet; his existence may depend upon it. The diseases are few which he has to fear, but mismanaged as they generally are, they are fatal. They may be reduced to this small number, and when properly understood and rationally treated, their terrors are wonderfully diminished:—

1 Plague; 2 Dysentery; 3 Ophthalmia; 4 Bilious Remittent Fever; 5 Ague; 6 Inflammatory Fever.

The traveller in these countries has little to fear from any other malady. The first I have spoken of rather fully in a former letter*; I endeavoured to show that it was the worst form of typhus; that blood-letting and purging were injurious, and that stimulants, such as wine and brandy, in full and frequent doses from the beginning, conjoined with repeated doses of James's powder, were the most successful remedies I had employed or known others employ; and that, with such treatment, the mortality was very small.

Of the second disease, *dysentery*, having had a great deal of experience, I speak with some confidence: I opened the bodies of seven English sailors who died of dysentery, in Alexandria, during the last two years, and in almost every case there was disease, either actual or incipient, in the liver: for confirmation of this fact I appeal to Dr. Schreiber.

There are only two modes of treatment which deserve consideration; one is, early, large, and repeated bleeding; the other, full and frequent doses of calomel till the mouth becomes affected, and in smaller quantities for some days after. I have only leisure and limits for plain facts. In a large practice, I had reason to prefer the latter mode of treatment: if any drug deserve the name of specific, calomel, in dysentery, has a title to it. I seldom gave less than twelve grains, thrice a-day, and very often twenty. An effect once produced on the salivary glands, the most urgent symptoms cease as if by magic.

The third disease, *ophthalmia*, is only to be subdued by large abstraction of blood, not by leeches, but from the arm, and repeated until every symptom of inflammation subsides. Cold and hot lotions are equally injurious; tepid ones, composed of decoction of marsh-mallows, with a few grains of sugar of lead, are extremely soothing, and applicable to every stage; but in the chronic cases, stimulant washes of alum and sulphate of lime† may be used with caution. If any inflammatory disease demand an abstemious regimen, and the free use of aperients, it is ophthalmia.

The fourth disease, *bilious remittent*

fever, is the most formidable of all, and the most important for the traveller to discriminate, for I have seen several Europeans fall victims to the error of mistaking this fever for ague or common intermittent. Wherever vegetable and animal decomposition are going on, wherever date trees are thickly clustered, wherever there is a saline incrustation on the soil, and a rank verdure in the vicinity, there that miasma is to be apprehended which produces bilious remittent fever. The distinguishing symptoms are, irritability of the stomach, oppression about that region, early delirium, and a lurid yellowness of the eyes; the subsequent symptoms are, vomiting of dark and viscid bile, fulness about the left side, intense headach, small rapid pulse, and often diarrhœa.

The treatment must be active, for it runs its course in from three to seven days, and rarely twenty: the first measure should be blood-letting from fifteen to twenty ounces, repeated if necessary next day, and the following ten grains of calomel and one of opium, three times a-day, for four or five days, or till salivation is produced: every night six grains of James's powder, no emetics, but daily doses of castor oil or colocynth, are necessary. When the fever runs very high, and the skin is parched and burning, the body should be sponged with diluted vinegar. This treatment I have seldom seen fail, but where the inflammation of the irritable stomach and the gorged liver is aggravated by bark, given in ignorance of the disease, death has generally ensued.

The fifth disease, *intermittent fever*, or ague, is a malady which nine travellers out of ten must lay to their account if they only visit Cyprus, Candia, Ephesus, and Alexandria: fortunately, with ordinary care and prudence it is generally to be overcome, when the traveller has the necessary medicines at hand; but I have known, in four cases, the want of the sulphate of quinine, and the impossibility to procure it in the upper countries, attended with fatal results.

The form the intermittent commonly assumes in Egypt and Arabia is tertian ague, leaving behind a strong disposition to recur at the same annual season, and in all chronic cases attended with enlargement of the spleen: from much observation, both on the living and the dead body, I look on that organ as intimately connected with the disease.

* See Gazette, page 242.

† Sulphate of Zinc?

The treatment is totally different from that of bilious remittent fever, and hence the necessity at the commencement of distinguishing between them.

An emetic should be the first measure, a purgative next; for the two following days small doses of calomel, with a little of James's powder, should be given; then, when the feverishness is lessened, the sulphate of bark or quinine should be commenced; it should only be given during the intermission of the paroxysms, and never during the hot or cold fits. It may be given in three-grain pills, four times a-day, and increased to six or eight-grain doses, three times a-day. This must be continued for a month after the fever has subsided, to avoid a return of it. When there is pain in the left side in the region of the spleen, which is common enough in hot countries, leeching or cupping must be had recourse to: the latter operation is very dexterously performed by the Arahs, and is to be preferred to leeches. The sulphate of bark judiciously administered never fails; it is an invaluable medicine in eastern countries, and the traveller who would set out without it, in the event of his falling a victim to this disease, might be considered accessory to his own fate.

The sixth disease, or *inflammatory fever*, is the true synocha of Cullen, and the fatal endemic of hot countries. It very often runs its course in thirty hours; its average duration is from three to nine days. Exposure to the sun in travelling is the most common cause. The patient is suddenly seized with headach, generally referable to the back of the head; he can lay his finger on the precise spot; he complains of having got "a stroke of the sun." Vomiting comes on, pain in the back, inflamed eyes, suffused cheeks, inquietude, and delirium, if left unassisted two days; death ensues probably the fifth or seventh day. From the first moment of the seizure, the most active treatment is necessary: twenty ounces of blood should be taken away at once, and if the headach continue, as much more in six hours, and again repeated if necessary; a full dose of colocynth pill, or jalap, should be next administered; after its action, if there be much nausea, an emetic may be given; at night, five grains of calomel and as much James's powder should be taken, and the drink should be infusion of

tamarinds tepid. The body should frequently be spunged with vinegar and water, and where the skin remains hot and parched, instead of spunging, I have had the vinegar and water applied with a cloth glove, such as they use in the vapour baths, with a good deal of friction, till the pores have been opened, and a gentle perspiration followed. It is astonishing what benefit this affords, where the common spunging is totally inefficient. The effects produced by the coarse cloth glove, in the Turkish bath, in exciting perspiration, first suggested to me the application of the vinegar in the same way. Its soothing and refreshing effect is no less sudden than surprising. The calomel and James's powder should be repeated next day, and again at night, if the symptoms abate not; purgatives must also be continued, but in this fever the lancet is the sheet-anchor. In ordinary cases, and in strong constitutions, I have seldom considered the patient safe before he lost fifty ounces of blood.

This brief outline of the six diseases which the European traveller has most to apprehend in Greece, Egypt, Palestine, and Arabia, I am aware, is a very imperfect and incomplete account. Each disease, I well know, would require a volume to describe, but it is very probable the traveller would never undertake the perusal; and summary as this notice of the treatment of each disorder is, the few hints I have thrown out, a little while ago might have preserved the lives of many of our enterprising countrymen. I have before repeated that both Burckhardt and Belzoni fell victims to the gross mismanagement of their disorders; for dysentery, the former was drenching himself with laudanum up to the very day of his decease; of this his servant Osman assured me. The celebrated Prussian naturalist, who lately died of bilious remittent fever on the coast of the Red Sea, also perished from his own ill treatment of his disease. One of his attendants, an intelligent Arab, told me, his only medicine was bark and rakee. I could name many other fatal instances, but these may suffice to show the importance of giving the traveller some information, in however cursory a form, on maladies which nothing short of actual experience can qualify a man to speak of*.

* Condensed from Madden's Travels.

THE MEDICAL PROFESSION.

To the Editor of the London Medical Gazette.

SIR,

IN the Number of your Gazette for the 15th August there is a letter subscribed "MEDICUS," in which the writer laments that "so many (medical practitioners or physicians) become illustrious 'as antiquarians, poets, humanists,'" &c. doubtless "upon this ground, 'that they find their mediocrity or excellence in their art maketh no difference in profit or reputation towards their fortune.'" And in another place he surmises that there "are men who, having met with 'witches, old women, and impostors,' for competitors, have said, 'why should we labour to be more wise?'—and therefore 'intend some other art, which they fancy more than their profession.'" With deference to this unknown author, it appears to me, that the man who deserts his station from any of these causes deserves our censure, rather than commiseration; and that the individual, instead of the public, possesses the surest means of advancing his own interests. From the pervading feeling of the letter I do not dissent; for we must always regret that the love of wealth has seduced many, that the want of patronage has enfeebled some, and that the prosperity of the stupid has disgusted a few members of an honourable profession: but we will endeavour to trace the source from which the principle of a stable conduct may be drawn, and which will continue to supply us with confidence and comfort under every change of fortune; being convinced that if the "mountebank" and "impostor be prized, and the man of virtue taxed," there is the greater demand for the individual exertion of every upright man.

The strength and beauty of the medical character consists in a clear intelligence, a strict morality, and a well-disciplined education. Few, however, possess these qualifications combined in an eminent degree. Genius is the gift of Providence; and we may not repine if our mental powers do not exceed the measure of ordinary capacities. But the disposal of our own conduct is always under control, and we are in ourselves responsible for every deviation from the rule of right reason; while

that kind of education by which latent talent is slowly produced, and professional information gradually acquired, completes and presents the portrait of an individual prepared for active duties and probable success, according to the degree of his endeavours and original abilities. The frailty of nature, however, often prevents or interrupts this perfect scheme of medical excellence; and the disasters of manhood sometimes unhappily result from the wayward follies of youth; for there is a season in every man's life when the judgment yields to passion, and affection warms the opening prospects of the world; notwithstanding the temperate regulation of our most honourable desires is evermore necessary to ensure a grateful ease, as well as worldly advancement. Yet, with every accomplishment which study can adorn and integrity promote, the heart may be chilled by disappointment and the judgment corrected by misfortune; reputation and distinction may arrive at an age when the mind is roused with difficulty to active joy, and wealth may accumulate when it has ceased to be sought for, and is too late to facilitate the happiness of youth. Honesty may be neglected, genius blighted, and learning despised; nevertheless, he who has endeavoured to deserve the best that may happen will find consolation even in failure, nor will he repine if the ignorant and crafty boldly seize upon that reward which is due only to the modesty of unpretending worth; since it is his obvious duty to feel assured that it is better to be unfortunate than to succeed by disreputable means.

From this ideal picture of a worthy gentleman and scholar, we turn to the passing scene before us, and immediately discern by how much many depart from this standard of perfection. In every rank of society will be found a class of men to whom these observations will appear frivolous and romantic; nor are they addressed to the "booted" practitioner, who drives his own vehicle with the rapidity and precision of a groom; for *he* cannot bring ease to the bed of sickness, nor administer consolation to the disordered mind. The man who supplies by forwardness his want of solid information; who conceals his ignorance by hazardous assertions; and who deceives his idleness with the busy fabrication of

groundless opinion, can neither feel for himself nor truly accord with the feelings of others. We smile at the immeasurable distance between such men and the early fathers of physic, while we regard their errors with a benevolent consideration, and trust that their froward actions are produced by honest but misdirected principles. The charlatan may be prosperous and happy, for ignorance is confirmed by success, more especially in medicine, the rudiments of which science are beyond the reach of vulgar comprehension: but there is, in the practice of the healing art, something more noble than the mere acquisition of money. If we review and inspect the characters of those physicians who have been eminent during their lives, we shall observe a mildness of spirit, and benignity of conduct, which rendered their knowledge pleasing and their attentions affectionate. Aware of the imperfection of their art, they commiserated the afflictions of their fellow creatures, and earnestly applied their limited means of cure or relief with studious energy and hopeful perseverance; and, though they were confident in their mental powers and acquirements, advanced themselves only on the legitimate ground of unassuming merit. In the course of human events, the hour of action must arrive to all; and the period of employment will surely reveal the secret treasures of retired study, and develop the exact proportion of personal talent. Such men were Boerhaave, Sydenham, and Browne. The genius and amiable qualities of the polite and pious Sir Thomas Browne did not escape the eye of Charles the Second; nor was a dissolute monarch, in a licentious age, ashamed to reward the author of the "*Religio Medici*;" and, although in the language of his panegyrist, Mr. Whitefoot, "the horizon of his understanding was much larger than the hemisphere of the world," he did not forsake the uncertainty of physic for the more lofty reputation of a philosopher. The writings of Sydenham are the best comment on himself; but his pensive and inquiring worth was the fruit only of long study and labour; nor did he desert his profession because he had raised many enemies "by the superior merit of his conduct and the brighter lustre of his abilities." The evening of life closed in upon Boerhaave, and found him in

the vale of years still studious and religious, endeavouring to dispense for the maladies of others that relief which he had failed to procure for himself. (See Dr. Johnson's *Lives of Boerhaave, Sydenham, and Browne*.) Yet these men might have been unfortunate, and consequently unknown; they might have pined in obscurity, or cheerfully laboured under the pressure of honest poverty. We discover in their histories the example of men industriously content with each passing condition of life, while sedulously cultivating those means which might finally fit them for the highest stations: and it may be advanced as a moral axiom, that no man is great of himself, but only according to the degree of his talents and acquirements, as well as the exigencies of the times.

No idea is more common and delusive than that great talents must always ensure great success; and, without considering the necessary combination of favouring circumstances, many believe that they will be able to surmount every difficulty merely by the power of their own abilities. From instances of those who have been held in esteem and admiration because they have boldly departed from the daily routine of life, and have depended on themselves for success and uncommon distinction, inferences are deduced the most fallacious in themselves and the most disastrous to private ease and contentment. To allow ourselves to be influenced by a single example from a million—to think with fond credulity that we, out of the whole world, shall be so happy as to gain the prize—is to evince an enormity of self-love almost incompatible with the exercise of right reason; although every wise man will trust that he *may* gain, by diligence and perseverance, what is open to all, and that, though he has to strive against a million, he *may* possibly be the one to win. But nothing is secured by vacant anticipation, and nothing confirmed by only believing in ourselves: continual industry is the best security for the supply of our present wants, and a humble apprehension of failure the prognostic of future success. All who have risen to any degree of eminence, have trod with difficulty and hard labour the steep ascent; and none have attained to pre-eminence but by a happy combination of peculiar circumstances and peculiar talents; every

one, according to his avocations; being compelled to cultivate and adorn his understanding with the same unwearied zeal and careful attention, if he propose distinction to himself as his ultimate object; since more will be required at his hands, in just proportion to the measure of his pretensions. No man can maintain any station for which he is not, in some degree, already fitted; and few have ever anticipated the smiling fortune of advancing years; for life is a varied scene of unexpected accidents, in which “the race is not always to the swift, nor the battle to the strong.”

MEDICULUS.

August 18, 1829.

MEDICAL GAZETTE.

Saturday, August 29, 1829.

“Licet omnibus, licet etiam mihi, dignitatem *Ar-tis Medicæ* tueri; potestas modo veniendi in pub-cum sit, dicendi periculum non recuso.”—CICERO.

ON THE LITHOTRITIC PROCESS.

OUR attention has been recently called to an operation, novel in this country; its object is the alleviation of much human suffering; and if lithotrity (the name by which it is known) succeed to an extent at all commensurate with the expectations held out by its patrons, it will accomplish that object in a very eminent degree. The disease for which it offers a remedy has afflicted mankind from the very earliest ages; but in later times, either from an actual increase in the proportion of those who labour under it, or from the numerous and meritorious efforts made, particularly by our own countrymen, for its cure, it has become singularly familiar to modern ears. The utmost that has been effected, after all, has been to bring nearly to perfection the operation of lithotomy, one of the most painful, as well as dangerous, in the practice of surgery: “an operation, the improvement of

which has been an object of concern to princes and parliaments, to societies and convocations of learned men; while individual physicians, labouring under the torture of the stone, and looking forward to what they were themselves to suffer, have taught bold but unskilful men how to perform it, with all the precaution which science and the study of anatomy could suggest*.” Yet it is an operation, the failure of which, even in the ablest hands, is not uncommon—a trial of skill of so peculiar a nature, that the very address and dexterity of the operator may lead to injurious consequences. In fact, lithotomy may prove unfortunate from being *too well* performed—judging, at least, as men are wont to judge in regard to other operations—a startling assertion, no doubt, but not the less true; and if to this be added, that it is always terrible to the contemplation of the patient, and inevitably attended with exquisite pain, the measure of its inconvenience is complete.

In this state of things the new operation, lithotrity, is presented to us with strong claims upon our attention. The knife, we are told, is to be dispensed with. There is little pain inflicted; no blood is effused; and, finally, the cure is as perfect as even lithotomy could pretend to. Such is the brief abstract of its advantages, set before us in the most favourable point of view; dazzling enough in all conscience for the unfortunate afflicted, and, if verified by future experience, meriting all the terms of commendation which our Gallic neighbours have bestowed upon it.

A short review of the history of the process may not be uninteresting: its origin is curious. It is not one of those valuable accessions to science and the public good resulting, like those of Watt or Davy, from direct reasoning, or a wise adaptation of means to the

* John Bell's Principles.

end; nor was it immediately hit upon by a lucky accident. It occupied no portion of the thoughts even of its inventor when he began the course of experiments which eventually terminated in its contrivance. His first design was to destroy the stone by a re-agent—a plan which had often before been attempted without success; but in endeavouring to accomplish his purpose, two difficulties arrested him: first, the danger of injuring the bladder by the chemical solvents which he should employ; and, second, his ignorance of the chemical composition of the material upon which he was to act. In order to overcome the former, M. Civiale thought of introducing a purse into the bladder, by means of a tube, through which, upon securing the stone in the purse, he was to pour in his powerful solvents. But where was such a purse to be had? It should be as wonderful in its properties as that of Fortunatus—it should be fine and flexible, and delicate and capacious; and, at the same time, perfectly proof against strong chemical agents. Here was a difficulty indeed—no substance in the animal, vegetable, or mineral kingdom, seemed adequate to the purpose; and the project was consequently abandoned. Yet the artist was not discouraged by his failure: fortunately he proceeded to combat with the second obstacle. As it was requisite to procure a specimen of the stone, it was obviously necessary to introduce some instrument that should break off a portion of it, without wounding the bladder. Having reason to think that it was not impossible to pass a *straight* sound, four lines or more in diameter, through the urethra, he made repeated trials, and ultimately convinced himself that it was perfectly practicable. Upon this principle his earliest instruments were constructed.

It is curious to observe that M. Civiale all this time never entertained any other

object in his experiments, than simply to procure the specimen for which he was so anxious; and that the idea of lithotrity, or grinding the stone to pieces, did not once occur to him, until he found himself obliged to give up his favourite project of the purse.

We need not enter into a detail of the successive changes and improvements which the ingenious inventor adopted in bringing his instruments to their present state of comparative simplicity and perfection; the reader will find them described with sufficient accuracy in Mr. Costello's letter (see our 88th number): we shall merely observe, that the six elastic branches originally employed are now reduced to three, and that the *lithotriteur*, or perforator, in all ordinary cases, is armed with teeth, which are set to work on the calculus by means of a drill. In ten or fifteen minutes an expert operator demolishes a stone of the common size—that is to say, one of about 18 or 20 lines in diameter.

One very obvious advantage of the new method we must not pass unnoticed. It is well known that persons afflicted with calculus, alarmed at the danger of being cut, procrastinate and put off the evil day, and endure, for years together, the most exquisite torture, rather than submit to the knife; while the stone, meantime, is acquiring additional bulk and complexity of character. All this, we suspect, will be materially altered when the new process comes to be better known: patients will have recourse to it in an earlier stage of the complaint, and their cure will, of course, be proportionably easy.

The objections made to this method are met by the following answers:—1. The introduction of *straight* sounds is no longer debateable: experience, both ancient and modern, has proved it practicable beyond a question; and it is demonstrable *a priori* from a know-

ledge of the structure and direction of the urethra*. 2. The expansive property of that passage very soon permits the introduction of straight tubes—three, four, or even five lines in diameter. 3. The pain is, in general, very inconsiderable; and where it proves severe, this is dependent upon disease of the bladder or neighbouring parts: nervous excitement there may certainly be in many cases; but if these objections have any force against lithotrity, they apply still more strongly to lithotomy. 4. The treatment is not tedious; and even if it were, perhaps many would think it preferable to be under the hands of a lithotritist for two months, than for two minutes under the knife of the most expert lithotomist. 5. On the supposition that the operator is competent (as should always be supposed in every operation), there is *no danger* in the process of lithotrity: an awkward operator, indeed, might do mischief through a want of address; but the same objection might be made even to phlebotomy itself, which in unskilful hands has been productive, as every body knows, of very grievous consequences. Nor is there better ground for other objections, such as alleged chronic inflammations of the urethra or bladder, &c. leaving behind pieces of stone, or other calculi untouched: such charges should be matter for testimony, but they have never been supported by either facts or experience.

Le Roy, Heurteloup, Amussat, and others, have, from time to time, suggested alterations and additions, by way of improvement, in the lithotritic apparatus; but the instruments employed by Civiale appear to us to be the most simple, and we are great admirers of simplicity in the construction of surgical apparatus. The march of improvement,

it may be observed, has ever been from what is more complicated to what is less so—nature herself is the mother of simplicity.

In conclusion, we think our readers will agree with us that the ingenious contrivance of M. Civiale is deserving of approbation. Our French friends, in the characteristic style of compliment, have pronounced it, “*glorieuse pour la chirurgie Française, honorable pour son auteur, et consolante pour l’humanité.*” It may be equally characteristic (perhaps national) in us, not to be dazzled with the *glory* of the invention; but we are not, at the same time, blind to its merits. With all due respect for the Academy of Sciences, and for the names of Chaussier and Percy, we cannot elevate ourselves to raptures. We are, in plain terms, disposed to qualify our meed of praise from the consideration of one or two circumstances. It is to be observed, in the first instance, that the lithotritic process is available in none but cases in which the stone does not exceed a certain bulk; and this is allowing much, as, in fact, it is admitting it to be available in all ordinary cases. Its machinery, however, is so complicated, compared with the simple instruments commonly employed in lithotomy (now reduced almost to the *prisca simplicitas* of the *apparatus minor*), that our anticipations, we must confess, are considerably damped; and, indeed, some of the instruments which we have seen appeared not altogether free from the risk of portions of them breaking off during the process of grinding the stone, and thus remaining in the bladder. The success of the operation, besides, mainly depends on the extreme familiarity of the operator with his instruments; though much of this objection will be removed, no doubt, when the process is better understood. The manipulation is so different from that required

* See M. Amussat’s Memoir on the practicability of effacing the curvature of the urethra by straight sounds.

in ordinary operations, that our most experienced surgeons will feel some awkwardness when they first attempt it; and we have heard that M. Dupuytren made trial of it in the Hotel Dieu without being successful. Any decided opinion, indeed, must be given cautiously: it bears upon it the fascinating stamp of novelty; it promises a great good, but it has yet to undergo the rigid test of time. Claims it unquestionably has, and strong ones too, upon our notice; and we are happy to find that it is being tried in our hospitals, where its merits will soon be put beyond dispute.

We have spoken of M. Civiale, throughout these remarks, as the true inventor of lithotritry; such is our persuasion. He was indisputably the first who made known to the public the possibility of performing such an operation; whether he was the first who *thought* of its feasibility we will not decide: but be it remembered that it was not until he had *published* his experiments that other competitors for the honour of the invention made their appearance. We cannot stay to moralize on the fate of most originators of useful projects; but we suspect that M. Civiale must be content to await tranquilly, though confidently, a tardy decision upon his claims.

SEQUEL OF THE CHOLERA AT CLAPHAM.

THE food and drink of the boys at the school at Clapham, as well as the contents of the stomach and bowels, were carefully examined by Dr. Burton, the Chemical Lecturer in the Borough, and no poison or other cause of disorder was detected in them.

It is now ascertained that a very foul drain, or cesspool, the situation of which was not previously known, behind the house, was accidentally opened, in making some alterations about the

grounds, a day or two before the disease occurred: the contents of this receptacle were taken out and thrown into a garden adjoining the play-ground, and separated from it only by a low and slight open paling. From this source it cannot be doubted arose the whole evil. Whether the sulphureted hydrogen itself was the agent in producing this pestilence, or whether that gas was merely the vehicle of some more subtle and abstruse miasma, it is not easy to say; but that the boys were freely exposed to this effluvia (however unintentionally and accidentally) is quite certain, and that almost every one of those who had been in the play-ground were attacked by the disease, is also equally undoubted.

We would beg to say that we have understood that the little boy who was the first victim of the disease, and who was said to have died in three hours after he was seized, was first attacked with vomiting and purging about six o'clock on Thursday morning; at twelve, convulsions came on, and he continued in them until seven o'clock on the following morning, when he expired.

No death took place after Monday, when the second of Mr. Day's sons died, and the rest of the boys were removed. All the latter recovered in the course of the week. It is remarkable that the younger boys were most severely affected, and that a man who actually fell into the cesspool escaped altogether.

The appearances after death in the two cases which died (as related in our last number), bore a striking resemblance to those delineated by Roideur and Wagler, as the results of the "*morbus mucosus*," which raged in Vienna between sixty and seventy years ago, and which probably owed its origin also to some analogous endemic effluvia. So far as the great intestine was concerned, the morbid change was very analogous to what takes place in the common fevers of this country.

EXAMINATIONS AT APOTHECARIES' HALL.

WE have frequently taken occasion to remark upon the benefits which have accrued to the public from the exertions of the Society of Apothecaries, in improving the standard of medical education. By an extract from the "Times," which we subjoin, we perceive that the comparative number of rejections has increased, and amounted in 1828 to about 20 *per cent.* When, however, the judicious system of attending to certain branches of study in a prescribed succession, which the Society originated in 1827, shall have had time to produce its full effect, we trust that the acquirements of the pupils will better answer to the test they have to stand. There is one only caution we would suggest; which is, to take care that the minimum of knowledge is not made too high: the effect of this would be to deprive a certain class of the community of the only medical attendants they can afford to have, and thus to throw them upon the wholly uneducated quack. We do not say that this has been done; but the Court of Examiners are treading unexplored ground, and every step requires caution.

"We have lately been favoured with the sight of a table, containing an account of the number of candidates examined, with the number of certificates given and refused, which certifies to the conscientious severity with which the Examiners perform their difficult duty. Since 1815, when the certificate of Apothecaries' Hall was rendered indispensable to the general practitioner, this severity has been augmenting for the advantage of the public and the respectability of the profession. In 1820, nearly 300 candidates were examined, and only 13 rejected; or, in other words, the admissions were to the rejections nearly as 1 to 23. In 1827, the number of candidates examined was 510, and the rejections were 70; or, as 1 to $7\frac{1}{4}$: and last year the number of claims for admission was 365, and the "rejected addresses" were 65; or, as

1 to 5, 8-13ths. Thus the number of unqualified persons, who stood an examination for certificates, has risen from less than 5 to nearly 20 *per cent.* within the last seven or eight years; and as we cannot presume that the Examiners are too fastidious now, we must conclude, either that they had been too careless before, or that the standard by which they now estimate the proficiency of persons to whom the public health is intrusted, has been raised in favour of the public security."

HOSPITAL REPORTS.

LA CHARITÉ.

Painters' Colic—Blindness—Delirium—Tetanic Symptoms—Administration of Croton Oil and Opium.

A PAINTER, 26 years of age, had suffered from attacks of colic during the last nine years. For a fortnight he had severe pains of the abdomen, which sufficiently marked the return of his *professional* malady. An emetic and purgative were administered by his parents, after which a *Doctor* was sent for, who, suspecting inflammation of the stomach, had 45 leeches applied at three different times; on the last occasion a large quantity of blood was obtained, as the leech bites were allowed to bleed while the patient was in the bath. The pain was rendered less intense by these means, but it became more diffused; the diaphragm and limbs were painful, and the patient bent forward to relieve his suffering. The head became affected; there were partial convulsions, his ideas wandered, and his vision was impaired. M. Cauzol was called to him on the 21st of July, when he prescribed powerful purgatives, notwithstanding the copious stools he had previously had. On the 22d he was admitted into La Charité, with furious delirium, convulsions, tetanic rigidity of the jaws, blindness, dilatation and immobility of the pupils. He uttered cries, in the midst of which the words "my head, my head!" were distinguished; while he kept putting his hands to his head, and exclaiming "cold, cold!" His pulse was very much disturbed. He was ordered "the purgative potion for painters," which was taken only in small quantity, on account of the rigidity of the jaws; they were then separated a little, and three drops of croton oil given in a little

tisane, the whole of which, however, was not swallowed. In the course of the day frictions were made on the abdomen with twenty drops of the same oil, and in the evening three grains of opium were given internally.

23d.—All the symptoms abated: the pupils were still dilated, but not immobile; the patient appeared to regain his consciousness; there were no convulsions nor spasms. Four grains of opium were administered in the same potion as before, and the same dose repeated in the evening.

24th.—The patient *awoke*—such is the expression which conveys the best idea of the great change which had occurred. His vision was perfectly restored; he spoke, understood, moved his jaws, and the whole appeared to him only to have been a dream. The opium was repeated*.

HOTEL DIEU.

Polypus of the Posterior Nares.—New Mode of applying a Ligature.

A YOUNG man, sixteen or seventeen years of age, of good constitution, affected for several years with difficulty of breathing through the right nostril, was admitted into the Hotel Dieu the beginning of July 1829. The sound of his voice was nasal; the roof of the palate was pushed down, and formed a rounded projection into the mouth; the finger carried behind it discovered an unequal tumor, hard, indolent, and with a large base, taking its origin from the cranium on the right side, and probably of a fibro-cellular tissue. Tearing it away, or applying a ligature, were the only methods of cure which presented themselves; but the size of the pedicle, and the firmness with which the polypus adhered to the parts from which it sprung, decided M. Dupuytren rather to employ the ligature. A great disadvantage attending the forcible tearing off of such tumors, is the inflammation which is sometimes communicated to the neighbouring parts; and M. Dupuytren has two or three times seen individuals die of inflammation of the membranes of the brain in consequence of it extending to them. The ligature presents no such formidable accidents; but, on the other hand, it offers difficulties which sometimes appear to be insurmountable. To obviate this, M.

Dupuytren contrived an instrument consisting of a hollow stalk, about six inches long, and as wide as a large sound; one of its extremities is flattened, and half an inch in breadth: at each side of this extremity is a small opening, with a thread of silver. The thread passed through each of the holes, and with the ends in the stalk of the instrument, forms a noose. This noose is enlarged or diminished at will, inclined to the right or left, and gives the surgeon great facilities.

July 6th.—The noose was placed round the polypus with great ease, and moderate constriction employed. A considerable quantity of blood flowed by the mouth, nose, and a little by the ear. Lest the tumor, when it dropped, should fall upon the glottis, and cause suffocation, a ligature was passed through it, and brought out at the mouth, being fixed on the cheek by sticking-plaister.

8th.—The tumor black and livid, exuding from its surface fluid of a horrible smell. [Gargle of water with a little of the liquor of Labarraque.]

12th.—The polypus dropped, and was easily removed by means of the thread which had been passed through it. It was about the size of a hen's egg, of a brownish red colour: being cut, it presented a fibro-cellular structure, filled with blood.

The patient's nostril was nearly as much blocked up as before the operation, and on introducing his finger, M. Dupuytren discovered a fungous excrescence on the site of the polypus, so that a return of the disease seems inevitable*.

ST. GEORGE'S HOSPITAL.

Rheumatism.

CASE I.—*Acute Rheumatism—employment of Guaiacum.*—Henry Gartland, æt. 33, admitted June 10, under Dr. Seymour, with both feet swelled, but not red; pains so severe that he could not attempt to stand up without imminent danger of falling; pains worse at night, but relieved by sweating; some cough; no pain in the chest nor dyspnoea; pulse 100; tongue clean; bowels open. Had been ill a week, and attributed the attack to sleeping in a damp bed.

V.S. ad $\frac{3}{4}$ x. Mist. Guaiaci $\frac{3}{4}$ iss. ter die.
Bibac ad libitum dec. Hordei. Low diet.

* La Clinique.

* Journal Hebdom.

The blood abstracted was a little buffed; and no material alteration having shewn itself on the 14th, he was ordered a grain of opium every night at bed-time.

15th.—Slept well; says that the medicine (guaiaac.) purges him; pulse 80, not strong; no heat of skin.

Perge.

On the 21st we find the following note:—Makes no complaint, save of slight debility; pulse 72, bowels open.

On the 23d he was discharged cured.

CASE II.—*Diffuse Rheumatism—employment of Calomel and Opium.*—John Powell, æt. 29, a labouring bricklayer, admitted June 24, under Dr. Chambers, with diffuse pain and swelling of the joints; the former worse when hot, especially at night, and relieved by sweating; pulse 110, rather hard; skin dry, but cool; tongue white; bowels costive; urine free and high coloured. Ill five weeks, and first seized with urticaria, which has not yet entirely subsided. Knees were the joints first attacked, and subsequently the others were affected. Attributes his ailments to damp.

R Cal. gr. viij. Op. gr. ij. bis die.

Haustus Sennæ omni mane. Diæta parcissima.

27th.—Pains relieved; sweats profusely; mouth affected by the mercury.

Omitt. Calomel.

Sumat Opii Indici gr. ij. o. n. Haustus Sennæ ut antea.

On the 29th he was ordered middle diet; and on the 6th July, the bowels being confined, had a dose of house physic.

On the 10th he complained rather more of his knees; the pulse was frequent and full, the skin dry, tongue whitish, bowels open.

Calomel. gr. v. Op. gr. ij. hâc nocte.

On the 17th he complained only of stiffness, and was directed to use the warm bath every other day.

On the 20th he expressed a wish to become an out-patient, and was made so accordingly.

It should be mentioned that the former patient returned several times to the hospital after his dismissal, complaining of slight rheumatic pains about him; and the latter can scarcely be said to have been perfectly cured. These circumstances should always be taken into the account in calculations on the results of hospital practice.

CASE III.—*Diffuse Rheumatism—Pain and Tightness in the Chest—employment of Bleeding with Calomel and Opium.*—J. Dixey, æt. 28, a footman, admitted July 20, under Dr. Chambers, with diffused rheumatism, occupying the legs and arms; aggravated by warmth, and not relieved by sweating. Pain and

tightness across the chest, pulse frequent and full, skin hot, tongue white, bowels open. Ill a week with preceding symptoms. Had scarlatina three weeks previously.

V.S. ad \bar{z} xij. Calomel. gr. viij. Op. gr. ij. o. n.

Haust. Senn. o. m. Diæt. parciss.

22d.—Rep. V.S. ad \bar{z} xij. Perge c. aliis.

24th.—Much relieved.

Cal. gr. v. c. Op. gr. iss. o. n.

Haust. Senn. o. m.

On the 27th he was deemed convalescent, and merely ordered one grain of opium at night, house physic every other morning, and the ordinary diet of the hospital.

On applying the stethoscope, the sound of the contractions of the left ventricle was rather prolonged and rough; the *impulsion* was not great, but still rather more than naturally exists. These circumstances, with the preceding pain, &c. in the precordia, rendered it not improbable that a slight, and but a slight, degree of hypertrophia of the left ventricle was present.

The patient is still in the house, and has not relapsed.

CASE IV.—*Diffuse Rheumatism—Hypertrophy, with some Dilatation of the Left Ventricle of the Heart.*—Thomas Gilbert, æt. 15, a paper-hanger, and delicate looking lad, admitted May 6, under Dr. Chambers, with following symptoms:—Pain of limbs, without swelling; aggravated when hot, and relieved by sweating, to which he is very subject; strong action of the heart, with flattened thorax on each side of sternum, or, in vulgar language, has the “chicken breast;” pulse small and frequent; skin moist and cool; tongue a little furred; bowels open; urine free. Ill for 13 weeks with the pains in the limbs; accompanied for the first month or five weeks with swelling. Has suffered from hæmorrhoids and prolapsus ani for the last two years.

Baln. tepid. ter in 7mâ. Haust. Salin. c. Tinct. Hyosciami 3ss. 6tis horis.

On the 8th he was ordered a belladonna plaister to the precordial region; and on the 11th some house physic.

On the 18th he had a fresh accession of rheumatic inflammation, about the first joint of the little finger of the right hand, unaccompanied with effusion into the articulation. The pulse was frequent, but soft; skin cool by day, hot at night; tongue white; bowels open

Calomel. gr. v. Op. gr. j. hâc et crast. nocte.

Haustus Sennæ cras. mane.

The pain and swelling were relieved by the 20th, and the palpitation cordis was less. The

calomel and opium making him sick, he was ordered half a drachm of the vinum colchici every night in camphor mixture, in conjunction with the warm bath.

On the 22d he complained of sore throat; and on the 25th was prescribed—

Cal. gr. iij. Op. gr. j. hâc et crast. noct.

June 1st.—Suffers much from uneasiness and pain at the epigastrium, obviously referrible to the cardiac affection.

Poppy fomentation.

3d.—Distressing pain in the back of the head and down the neck; anxious, pale countenance; pulse frequent and full; skin hot and moist; tongue slightly furred at the root; urine free; bowels open.

Venæsectio ad 3x. Perge.

The blood abstracted proved to be inflamed. The epigastric uneasiness was relieved, but not so the pain in the head; the pulse, on the 5th, was 96, soft and weak; the skin clammy.

Emplast. Canthar. nuchæ. rep. med.

On the 12th we find, by the report, that the lad was extremely nervous, and the following note is made of the examination of the heart by the stethoscope. Action of the organ heard pretty generally over the chest, (the boy is thin). Action of the right chambers does not appear to be stronger than natural; not so that of the left. The impulsion of the left ventricle is considerable, and its sound rough and grating, indeed closely resembling the *bruit de scie*. From these signs it was obvious that hypertrophy of the left ventricle existed, with some dilatation of its cavity. On the 15th, the heart's action was very violent, the *bruit de scie* distinct, and an evident pulsation was perceived in the great vessels at the root of the neck on either side. On the 19th, he complained greatly of pain in the back of the head and right arm, and was ordered the tincture of hyosciamus, in salines, every six hours, without any other medicine.

24th.—Has lately had a fresh attack of rheumatic inflammation about the right ankle, from which however he has almost recovered. Still much pain in the occipital region. Distressing flatulence.

R Aq. Ment. vir. Aq. Puræ, aa. 3v.
Mag. Carb. ʒj. Vini Colch. 3ss. bis die.

The flatulence was mitigated by these means, but the pain in the head continued severe, and on the 26th a seton was placed in the back of the neck, with the best effects in relieving this obstinate and unpleasant symptom. On the 6th of July the colchicum was discontinued, but little alteration, either in the features of the case or the

treatment, occurred from this period till the early part of August, when he was made an out-patient at his own request. The only circumstance worthy of note in this interval, is the application of a blister to the left side, on account of pain there. At the time of his leaving the house, the severe symptoms had all disappeared, but the organic affection of the heart remained, and the sure seeds were sown of the patient's eventual destruction.

The foregoing cases form a kind of climax or scale of rheumatic affections. The first was a simple instance of acute rheumatism yielding readily to moderate treatment; the second was a more severe and more protracted case; the third shewed a suspicious thoracic implication; and in the fourth the rubicon was passed, and the heart indisputably and irremediably affected.

WINCHESTER COUNTY HOSPITAL.

Extirpation of a Steatomatous Tumor from underneath the Angle of the Inferior Maxilla.
—Hæmorrhage.—Ligature on the Carotid Artery.

WILLIAM GIBBS, a delicate youth, æt. 16, admitted with a tumor, in dimension about the size of a large walnut, situated under the arch of the inferior maxilla, on the right side, and contiguous to its angle. It was apparently quite detached from the surrounding parts, being perfectly moveable in all directions. To the feel it was extremely firm; had been two years attaining its present magnitude, and had made its appearance first on the masseter muscle, but, with its increase in size, which had been considerable within the last six months, it had descended into its present situation, proving no less annoying than painful. The patient was anxious for its removal, and the operation was performed accordingly, in the following manner. The patient being seated in a chair, the tumor was brought from its situation under the jaw, and firmly retained on the masseter muscle. A perpendicular incision, to the extent of two inches and a half through the integuments and cellular substance, exposed the tumor; this was readily dissected away; it was, however, most liberally supplied with blood-vessels, no less than five arterial branches of no inconsiderable calibre having been divided. The hæmorrhage was extremely profuse, and the vessels were not secured without much difficulty. The wound being dressed with the adhesive plaister and bandage, the patient was removed to bed in a very exhausted state. Two hours having elapsed after the operation, blood was observed to issue somewhat freely from underneath the bandage. The whole of the dressings were removed by the house-surgeon, with the view of securing

the bleeding vessel; but this could not be effected, and nothing short of very considerable pressure on the carotid artery was of the least avail in suppressing the hæmorrhage. On Mr. Lyford's arrival, the boy had become so reduced that it was judged more prudent to apply a ligature around the carotid artery than to lose any time by searching for the bleeding vessel at the wound.

Operation.—The patient was placed on the table in the recumbent posture, and the parts placed moderately on the stretch, by flexing the head towards the opposite shoulder. An incision on the inner edge of the sterno-mastoideus muscle, to the extent of two inches and a quarter, laid bare the omo and sterno-hyoideus muscles; these were drawn towards the trachea, and the jugular vein exposed.

At this stage of the operation the difficulty described by Sir A. Cooper was realized, arising from the swelling of the jugular vein, and the protrusion of it before the artery: the blood ebbing and flowing through it in correspondence with the respiratory efforts; and some difficulty was experienced in avoiding it, and withdrawing, by means of the aneurismal needle, the artery from beneath it. This being accomplished, one ligature only was applied, without the occurrence of any untoward circumstance. The external wound was approximated by the adhesive plaister, and the patient removed to bed.

10 P.M.—Has been attacked with a severe rigor, which lasted twenty minutes, but subsided on the application of warm bottles to the feet, and the exhibition of some warm tea, with a dose of the aromatic spirit of ammonia and camphor mixed. Has had no sleep since the operation. Pulse 100, and feeble. Ordered an anodyne draught.

2d day.—Has had some disturbed sleep during the night. Pulse 110, and less weak. Has passed no urine since the operation; complains of extreme pain and difficulty of deglutition; skin hot and dry; is unable to protrude the tongue from the mouth. Ordered the catheter to be introduced, and a small dose of castor oil to be given immediately.

3d day.—Has experienced a great disposition to sleep, which has been counteracted by a constant tickling or irritation at the upper part of the throat. Bowels have been relieved; is enabled to pass his urine without inconvenience; the difficulty of deglutition somewhat abated. Ordered to take a tea-spoonful of the following mixture occasionally.

Syrup. Papaver. ℥j.

Oxymel Scillæ, ℥ss.

Mucilag. G. Acaciæ, ℥j. fiat mistura.

5th day.—The wounds have been dressed for the first time. The upper one, from

which the tumor was removed, had not adhered; it contained some firm coagula, which were removed, and the edges brought in contact as before by the adhesive plaister. The lower wound, at which the artery had been secured, united throughout its entire length, except at the place where the ligature issued. The irritation about the throat, and difficulty in protruding the tongue, have both nearly disappeared. Pulse 96; skin moist.

12th day.—Patient has improved much in his general appearance as well as in his spirits, which had been much depressed. The wounds have been dressed every second day since the last report; and to-day the ligature from the carotid artery, together with two ligatures from the upper wound, have come away without any force having been applied. All the unpleasant symptoms having subsided, he expresses himself as being in every respect quite comfortable. He has not been allowed to eat any solid food whatever. Pulse 86; skin moist; tongue clean.

15th day.—Wounds dressed; the lower quite cicatrised; the remaining ligatures from the upper wound came away with the dressings; the incised part itself much contracted. Ordered solid food for the first time: dinner to-day to consist of fish.

24th day.—The wounds healed. Patient discharged convalescent.

The difficulty experienced in securing the vessels, and the subsequent hæmorrhage, are to be attributed to the circumstance of the tumor having been withdrawn from its situation under the jaw, to the more commanding position on the surface of the masseter muscle; the extension of the vessels, supplying the diseased part being thus affected, their incision was succeeded by such an immediate and powerful retraction deep within the wound, in the direction of the original seat of the tumor, as to prevent the possibility of detecting with certainty all the arterial branches which had been divided during the operation*.

WORCESTER INFIRMARY.

Hemiplegia.—Employment of Strychnia.

JAMES JEVONS, æt. 10, came into the Infirmary May 30th. Has partial paralysis of the right side; occasional headache; the pupil of the left eye contracts very irregularly; pain and tenderness in the hypogastrium; intellect much impaired; memory very bad; looks idiotic; tongue, when projected from the mouth, is directed towards the paralytic side; bowels costive; tongue clean; pulse 84, weak. About Christmas last had a fall from a cart, and received a severe wound over the left orbit, from which time

* Provincial Medical Gazette.

he has complained of occasional headache. Has had symptoms of hemiplegia for five weeks; has been under surgical care, but obtained only temporary relief.

Applic. Hirud. xii. lateri capitis sinist.
Sumt. Haust. Cathart. \mathfrak{z} i. statim, et
repet. post horas tres, si opus fuerit.

June 2d.—Is much relieved by the application of the leeches. Head more free from pain; can raise his arm with more ease; walks better; pupil of the left eye contracts more regularly; tongue projected from the mouth in a straighter line; can move it to the left side with ease, which he could not do before; answers questions more readily.

3d.—Rept. Hirud. Cras; perstet in usu
haustus cathart. omni mane.

5th.—Is much better since the application of the leeches.

7th.—Applic. Emp. Lyttæ lateri capitis
sinist. postea. Ung. Antim. Tart. ibi-
dem.

9th.—Can use his extremities with much more facility; pupil of the left eye contracts naturally.

14th.—Sumt. Mistur. Cathart. p. r. n.

16th.—Opens the hand much easier, the extremities much less paralytic.

19th.—Sumt. Strichniæ, gr. 1-6 ter in dies.

24th.—Continues to improve.

Rept. Emp. Lyttæ Capiti.

July 7th.—Has continued to improve under the use of the strichnine.

Augeatur Dosis Strichniæ ad gr. 1-3
ter die*.

BOTANICAL GARDEN.

To the Editor of the London Medical Gazette.

SIR,

MANY gentlemen in different departments of the medical profession resident in the north-west part of the metropolis, are desirous of establishing a Garden of Medical Botany: a subscription is now going forward to carry this object into effect, and it is expected that a subscription of one guinea annually, with proper management, will be sufficient.

When it is considered that medical botany is now made a branch of medical education, and that there is no public collection of medicinal plants near town, the importance of the undertaking must be obvious.

The site will be either at Paddington or St. John's Wood.

Those gentlemen who wish to become subscribers, are respectfully requested to transmit to me their names and addresses.

When a sufficient number of subscribers

shall have entered their names, a general meeting will be called, when the plan will be fully detailed.

I am, Sir,

Your obedient servant,

JOSEPH HOULTON, F.L.S.

Secretary pro tempore.

11, Grove-Place, Lisson-Grove,
25th Aug. 1829.

DR. HARRISON & MR. PICKTHORN.

WE have received a note from Dr. Harrison, enclosing a paper on the subject of his quarrel with Mr. Pickthorn and Miss Orton, and which we have declined to publish. The general purport of the communication will appear by the following extract from the note to ourselves. "As you have given admission to my short answer to Mr. Pickthorn's first letter, I have to request that you will find an early place for my reply to his mendacious slander of to-day; otherwise I shall have to complain that you do not hold the scale of justice with an even hand."

At present the matter stands thus: Dr. Harrison commenced by making an attack on Miss Orton's private character. Mr. Pickthorn answered him. Dr. H. replied, and Mr. P. sent a rejoinder. Now, Dr. Harrison may "complain" as much as he pleases; but, as both parties have had their "say," and given each other the lie direct—as the question is one about which the profession does not care a farthing—and as Dr. H.'s paper, which we have refused to publish, reiterates indelicate charges against the private character of a young lady formerly his patient, we hold ourselves fully justified in adhering to the resolution stated in our last Number—namely, that we would not suffer the Gazette to be any further the vehicle of such a discussion. *Ne quid nimis*.

DEATH OF MR. WADD.

It is with much regret that we have to mention the melancholy death of this gentleman, which took place last week in the neighbourhood of Cork. Mr. Wadd was travelling in a post-chaise with Mr. Teggart, when the horses having run away, he unfortunately leapt from the carriage, and was killed on the spot, while his companion, who sat still, escaped without any injury.

Mr. Wadd was the author of several useful essays on Stricture, and other professional subjects, and of various *facetiæ*, which displayed considerable humour. His death causes a vacancy in the Council of the College of Surgeons: he had but very recently been appointed an examiner.

* Midland Reporter.

THE LONDON MEDICAL GAZETTE,

BEING A
WEEKLY JOURNAL

OF
Medicine and the Collateral Sciences.

SATURDAY, SEPTEMBER 5, 1829.

ON THE DIAGNOSIS
OF
ANEURISMS OF THE AORTA,
BY
GENERAL AND STETHOSCOPIC SIGNS.

BY J. HOPE, M.D.

[Continued from page 334.]

CASE I*.—*Dilatation of the Aorta—
Hypertrophy and Dilatation of the
Heart—Disease of the Aortic Valves.*

LINDSAY CORSTAIRS, aged 61, a printer, emaciated, but tall and of athletic conformation, complains of most distressing dyspnoea, worst in the night, induced by stooping or the slightest exertion, and sometimes supervening spontaneously.

During the paroxysm, the inspiration is sibilous, and the respiration so frequent and laborious as to throw all the auxiliary muscles of the neck and shoulder into vehement action. The countenance is at first universally flushed, in a minute or two it becomes deadly pale, and, finally, livid. The jugular veins swell and pulsate violently. The heart palpitates, and, with a powerful and profound succession, visibly shakes the whole chest and epigastrium. He is disturbed by frightful dreams, and starts from sleep in a paroxysm of gasping palpitation: somnolency is so oppressive, that he sometimes sleeps erect on a stool during a stethoscopic exami-

nation. Throbbing pain in the head, particularly in front; tinnitus; indolence, both mental and corporeal. Frequent cough, with copious expectoration of viscid, ropy mucus.

Œdema of the feet and scantiness of urine, of a week's standing only. Pulse 96, and extremely strong; appetite and digestion good; bowels costive.

His complaint commenced a year ago, and was at that time speedily relieved by venesection and purgatives. It recurred twice, at intervals of two months, and each time yielded, but with increasing difficulty, to the same remedies.

Stethoscopic Exploration.

Resonance, on percussion of the præcordial region, is deficient.

Impulse of the heart is perceptible over the whole anterior surface of the chest; but it is strongest on the left of the mesial line. Below the left nipple it is vehement; on the lower third of the sternum it is more languid, though still preternaturally violent. Between the spine and the left scapula a deep-seated movement is perceptible by the cylinder.

Sound of both ventricles is morbidly loud, and it is produced into the auricular sound, so as to leave little interval of repose. The sound of the left ventricle, explored below the nipple, is louder than that of the right, at the inferior part of the sternum. This is referable to a loud bellows-sound accompanying the systole of the left ventricle: it is less audible on the right side of the chest than on the left, and immediately below the left clavicle it is louder and more hoarse than in the vicinity of the left ventricle. In every situation a double sound is heard; but the second,

* In the following cases the diagnoses were written before the death of the patients, and were open for inspection in the dissecting room previous to the examination of the subjects. In my journal the names of the principal persons present are subjoined.

which is that of the auricles, becomes more distinct in proportion as it is explored nearer the heart.

The carotid arteries pulsate violently, and above the sternal extremities of the clavicles a remarkably strong impulse, with a peculiar vibration, which M. Laennec has aptly compared to cat's purring, is felt on application of the fingers. The stethoscope transmits a hoarse sound, like that of rasping wood, much louder and more abrupt than the bellows-sound in the præcordial region.

Respiration is in some parts "puerile," but in other respects natural.

Diagnosis.—Disease of the valves; great hypertrophy, and dilatation of the left ventricle; dilatation of the right ventricle, with a less degree of hypertrophy; congestion of the lungs, without alteration of structure.

Prognosis.—Death. He died four months after admission, the treatment having consisted in occasional sparing venesections, aperients, foetid antispasmodics, and rest.

Necrotomy.

The heart was more than double its natural size.

Right ventricle was dilated to the size of a lemon: its thickness, at the base was about four lines; at the apex, about two or three. The columnæ carneæ were remarkably large. The valves of the right side were small.

Left ventricle.—The parietes were about an inch thick at the base, and half an inch at the apex. The cavity was larger than that of the right ventricle. The mitral valve was natural; but the bases of the aortic valves were converted into dense fibro-cartilage, and formed a rigid ring, encircling the orifice. The loose margins of the valves, and particularly the corpora sesamoidea, exhibited the same morbid appearance; and the intermediate membrane was studded with patches of a dark red substance, resembling muscular fibre.

Aorta.—The ascending portion and the arch were double their natural size. The internal membrane was converted into a thick, knotted, and striated substance, of intense brown-lake colour, presenting the appearance of coarse muscular fibre; bedded in it, there were a few scales of rigid, but not osseous deposition.

Lungs were gorged with blood and serum, but they had not sustained any change of structure.

In this case I did not foresee dilatation of the aorta; for, as this was the first instance in which its physical signs had attracted my attention, I was totally unconscious that they were characteristic of the disease. However, the pulsation, the purring tremor, and the peculiarly abrupt, hoarse, rasping-sound, excited my curiosity, and induced me to make particular notes, with the view of ascertaining, by post-mortem examination, on what causes the phenomena depended.

In the diagnosis appear the words "dilatation of the right ventricle, with a less degree of hypertrophy." It might be objected that there was no hypertrophy of the right ventricle, as its parietes were not appreciably thickened; it, therefore, did not answer to the definition of hypertrophy given by Laennec, and of active aneurism by Corvisart.

But, when there is amplification of a cavity, without extenuation of its parietes, there must necessarily be an augmentation of muscular substance. This, therefore, is essentially hypertrophy, and it produces the symptoms of that affection, rather than those of "simple dilatation" or "passive aneurism*." In the present instance the action of the ventricle in question was morbidly increased; this, however, might have been partly owing to the great enlargement of the columnæ carneæ.

CASE II.—*Dilatation of the Arch of the Aorta, of the Carotids, and of the Heart—Disease of the Valves.*

Henry Stewart, æt. 48, many years a sailor. In 1815 he became a hewer in a stone quarry. A year previous to admission, after an uninterrupted course of good health, he was seized, in consequence of exposure to cold, with a severe cough and copious expectoration of foul mucus.

He states, that six weeks afterwards, while walking, his respiration was suddenly suspended, and he fell down, deprived of consciousness and the power of articulation. On recovering from the attack half an hour afterwards, he found himself affected with a severe pain in the epigastrium and abdomen. This was speedily relieved by antiphlo-

* The first term is employed by Laennec, and the second by Corvisart, to indicate the same condition.

gistic remedies, but it left dyspnœa, palpitation, and cough, which daily increased, and were exasperated into a paroxysm by the slightest exertion. These symptoms continue, and, in addition, he has almost universal dropsy, scanty and high-coloured urine, great somnolency, and frightful dreams, from which he suddenly awakes in a fit of palpitation and dyspnœa. The cheeks exhibit a vivid circumscribed redness, which is converted into lividity during a paroxysm. Turgescence, but no appreciable pulsation of the jugulars; pulse 90, full and bounding; acidity, and sometimes vomiting; great debility; no dysphagia nor pain in the chest.

Stethoscopic Exploration.—Above the sternal end of each clavicle there is a strong pulsation, extending, with diminished force, to the angles of the jaws: it is not perceptible immediately below the clavicles, or on the sternum.

The carotids, when grasped by the fingers, seem to be enlarged. A remarkably strong “purring tremor” accompanies the pulsation above the clavicles, and the cylinder transmits a hoarse, abrupt, rasping-sound, synchronous with the pulse. This sound, heard below the clavicles, seems softened and obscured by distance, and towards the third rib it becomes so faint as to be absorbed by the sound of the ventricles, which progressively increases as the auscultator approximates towards the præcordial region. Immediately after this sound, a second is heard: above the clavicles it is obscure, but it gradually becomes more distinct on drawing nearer to the heart, and is finally recognised to be the auricular sound.

Between the left scapula and the spine, a single, hoarse, abrupt, rasping-sound, is distinctly heard.

The left ventricular sound consists of a loud bellows-murmur, combined with a peculiar sibilus, and it is prolonged into the auricular sound. The latter has the character of the natural ventricular sound, and it is continued into the bellows-murmur which succeeds it.

The right ventricular sound is clearer than natural, and the auricular has much bellows-sound. Both are louder than on the opposite side.

The impulse of the heart does not sensibly elevate the thoracic parietes, but it communicates to the chest a suc-

cussion stronger and more extensive than natural, being perceptible in the epigastrium and below the seventh ribs, especially on the left side. Over a corresponding extent, resonance, on percussion, is deficient.

Respiration is in parts puerile, but otherwise natural.

Diagnosis.—Dilatation of the aorta and of the carotids. Dilatation of the heart; thickness of its parietes about natural. Disease of the valves. Structure of the lungs sound.

Prognosis.—Death speedily. He died three weeks afterwards.

Necrotomy.

The right ventricle would contain an average lemon. The thickness of the parietes was about natural, but the columnæ carneæ were somewhat enlarged. The valves were sound.

The left ventricle was rather more capacious than the right. The thickness of the parietes was half an inch at the base, and less towards the apex.

The mitral valve was slightly obstructed with cartilage.

The aortic valves were stiff with dense cartilage, and contracted in such a manner as to obstruct, without closing the orifice.

The ascending aorta and arch were dilated to the capacity of three fingers. The arteria innominata admitted the thumb; and the left carotid equalled the third finger. The origin of each was slightly contracted by a dense rough ring, which encircled it. The internal surface of the aorta was converted, partly into a cartilaginous substance, and partly into one resembling granules of cheese, being soft, friable, and of dingy yellow colour. This condition extended to the cœliac artery, and rendered the aorta so lacerable that it was rent asunder in being torn from the spine.

About four pints of serum were found in the cavities of the pleura. The texture of the lungs was sound.

It is evident that the unusually strong pulsation of the carotids was attributable to the enlargement of those arteries; that the impulse above the clavicles was due to the dilatation of the aorta; and that this state, together with the scabrousness of the internal membrane, and the contraction and roughness of the origins of the arteria innominata and

left carotid, were the causes of the purring tremor, and of the hoarse, abrupt, rasping sound.

The jugular veins were turgid, but their pulsation was scarcely appreciable. It has appeared to me that turgescence without pulsation is almost uniformly the condition of the jugulars in dilatation of the right ventricle, with extenuation of its parietes. On the other hand, in hypertrophy of the same ventricle, there is always pulsation: the cause of this appears to be, that the ventricle, when hypertrophous, contracts with inordinate violence, and closes the tricuspid valve so suddenly and powerfully, that the retrograde movement impels backward the column of blood descending into the ventricle, and renders its regurgitation sensible in the jugular veins. In simple dilatation, on the contrary, the languor of the ventricular systole elevates the valve so feebly, that no retrograde impulse is propagated to the jugular veins; and they remain permanently gorged, in consequence of impeded transmission of the blood through the heart and lungs.

The bellows-sound of the left ventricle, and the unnatural prolongation of the auricular sound, were accounted for by the diseased condition of the aortic and mitral valves. But whence proceeded the bellows-sound of the right auricle, the tricuspid valve being sound? Was it referable to some hydraulic agency, as, for instance, the following? The ventricle, being dilated, and not deficient in muscular power, expels at each systole more than the natural quantity of blood, and a corresponding excess must enter from the auricle to supply its place: but the size of the orifice is disproportionate to the increased capacity of the ventricle; consequently, the extra quantity cannot be transmitted in the requisite time, unless the velocity of the fluid be augmented; accordingly, it enters with morbid impetuosity, and thus excites the bellows-sound. The effect and its cause are precisely analogous when the ventricle is of natural capacity, but the valve contracted. It might be objected to this explanation that, on the same principle, a similar sound ought to be produced in a healthy individual, by acceleration of the circulation; but in a natural heart, the several parts bear a correct proportion to each other—the auricles to the ventricles, and the orifices to the cavities; conse-

quently the demand of each cavity is precisely equivalent to the supply, and to the means of its transmission through the valves. Hence the action of the whole is harmonious, and though the sound is increased, it is not unnaturally modified by the acceleration of the blood.

Why then, it may be asked, does arterial excitement occasion the bellows-sound in nervous individuals, apparently exempt from organic disease of the heart? This is an embarrassing question, and, I believe, that we are not yet possessed of evidence on the subject sufficiently irrefragable to sanction a positive conclusion; however, imputing the phenomenon to so vague and mysterious a cause as spasm, is a premature surrender to the difficulty, and it is one which is prejudicial to truth, as it conduces to scepticism respecting the fact that the bellows-sound is a necessary consequence, and, therefore, a positive sign of certain organic affections of the heart. It is no disparagement to Laennec to say that he did an injustice to himself in leading the way to the error of imputing too much to nervous spasm.

It is foreign to the present subject to enter into the discussion of this question; but I believe that the instances are extremely rare in which organic, may not be discriminated from sympathetic affections of the heart.

CASE III.—*Aneurism of the Aorta—Hypertrophy, Dilatation and Diseased Valves of the Heart.*

Robert Mackenzie, æt. 56, a tailor, is subject to a most distressing dyspnœa, which is excited by every species of exertion, and especially by ascending; occasionally orthopnœa; palpitation, the shock of which extensively shakes the left side of the chest; a harassing cough, with copious mucous expectoration; can only lie comfortably on the right side; his nights are disturbed by frightful dreams; great œdema of the feet; sometimes pains in the abdomen; pulse 108, very strong; bowels open, tongue clean, anorexia.

He states that he has been subject to pains in the abdomen and back for three years, but that the palpitation and dyspnœa are only of two years duration. The feet have been œdematous a week only.

Stethoscopic Exploration.

Above both clavicles, but especially the left, there is a remarkably strong pulsation and purring tremor, ascending with diminished force to the angles of the jaws; the pulsation is perceptible below the clavicles, particularly the left, and on the superior part of the sternum; lower down it becomes extinct.

The cylinder applied above the clavicles, transmits a single sound, extremely hoarse and grating, with an abrupt commencement and termination. As the auscultator recedes from the clavicles, in the direction of the heart, it decreases progressively, and is commuted for a duller sound, immediately followed by a second, which gradually increases on approaching the heart; and is finally ascertained to proceed from the auricles. Between both scapulæ and the spine, a single hoarse sound is heard.

Impulse of the heart is extremely violent, and it is perceptible beyond the natural limits. Resonance, on percussion of the præcordial region, is dull.

The sounds of the heart are, in every situation, morbidly loud; and the left ventricular systole is accompanied with some degree of bellows-murmur.

Resonance of the chest is good, except in the præcordial region; and the respiratory murmur is in parts "puerile," but otherwise natural.

Diagnosis.—Aneurism of the arch of the aorta; hypertrophy, and dilatation of the heart; valvular disease on the left side; structure of the lungs sound.

Prognosis.—Death within six months. He died in three months, the treatment having consisted of blood-letting, antispasmodics, diuretics, &c.

Necrotomy.

The liver was pale, granular, and a little harder than natural. The diaphragm opposite to the heart was convex towards the abdomen, and about three pints of fluid were found in each cavity of the pleura.

The lungs were sound in structure.

The heart was of an immense size, the parietes being enormously thickened, and the cavities greatly dilated. The aortic valves were thicker, and more rigid than natural.

The aorta, from its origin to the end of the arch, was dilated throughout its whole circumference; and in three parts it bulged still farther into pouches, equalling in size the half of an egg. At the posterior part of the arch, where

it begins to descend, there was a fourth pouch of much greater magnitude, and rising with more defined margins. The lining membrane of the aorta was rendered uneven and rugged by a dingy yellow matter, partly diaphanous, like cartilage, and partly opaque, like cheese. The tunics of the pouches were dense, but so extenuated as to be perfectly translucent.

In this case I was led to suspect the existence of aneurism, and not of dilatation alone, by the pulsation being perceptible below the clavicles and on the sternum, parts in which it is never developed by simple dilatation, unless it be enormous.

Purring tremor has invariably appeared to me to be more considerable in simple dilatation, than in sacculated aneurism. In the present instance, as pouches were superadded to dilatation, and to great asperity of the interior surface, the tremor existed in an extreme degree.

The hypertrophy of the heart was manifest from the vehemence of the impulse. The dilatation was indicated by the loudness of the sounds, and by the shock extending far beyond the natural bounds. The latter circumstance is a sign of dilatation, because in the greatest degree of pure hypertrophy* the impulse scarcely ever exceeds the limits of the præcordial region.

The bellows-sound indicated the obstruction of the aortic valves. I have frequently observed that when this sound has a soft character it is connected with a smooth surface of the diseased valve; and that when it has a harsh, grating, or rasping quality, it proceeds from a scabrous surface, occasioned by osseous deposition.

As there were no marked symptoms of hydrothorax at the time that the exploration was made, and as the hydropic affection did not make great advances until a short time subsequently, there is reason to suppose that the effusion into the chest was posterior to the stethoscopic examination.

CASE IV.—*Dilatation of the Arch of the Aorta.—Hypertrophy and Dilatation of the Heart.—Disease of the Valves.*

Agnes Downs, æt. 30, complains of

* i.e. Thickening of the parietes without amplification of the cavity.

a sense of uneasiness and oppressive weight in the chest, with dyspnœa, palpitation, and anxiety. Pulse extremely strong; great intumescence and pulsation of the jugular veins.

Stethoscopic exploration.—Above each clavicle there is a pulsation, with "purring tremor," and an abrupt, hoarse, rasping sound. The impulse of the heart is powerful, and extends beyond the natural limits. The ventricular sound is accompanied with loud bellows-murmur.

Diagnosis.—Dilatation of the arch of the aorta; hypertrophy, and dilatation of the heart; disease of the valves.

The patient left the Infirmary, and I am indebted to my friend Dr. Mackintosh, of Edinburgh, for an account of the post-mortem appearances.

Necrotomy.—The arch of the aorta was dilated, the heart was greatly enlarged, and the aortic valves were so diseased as to be incapable of discharging their function.

The cases hitherto related, and also Case 9, illustrate dilatation; the remainder relate to sacculated aneurism.

CASE V.—*Aneurism of the Aorta*.—*Dilatation of the right Auricle*.—*Phthisis*.

Mary Douglas, æt. 54, very emaciated; has dyspnœa, palpitation, harassing cough, with wandering thoracic pains, and expectoration of viscid, greenish, and sometimes blood-tinged mucus. Cannot lie on the left side. Pulse 112; tongue very foul, and white; bowels open; great prostration of strength.

Says, that for seven years she has been subject to dyspnœa, palpitation, and cough, recurring at intervals, and excited by any violent exertion. For the same period her health has been shattered and strength impaired. Her symptoms assumed their present aggravated form only a fortnight ago, in consequence of exposure to cold.

Stethoscopic exploration.—A dead sound is elicited by percussion above the sixth rib, on the right side of the breast. Resonance is elsewhere tolerably good.

Impulse of the heart is not perceptible, but there is an obscure motion, as if the thoracic parietes were struck without being elevated. Three inches below the right clavicle, near the

sternum, there is a distinct pulsation, perceptible even to the hand. The ventricular sound has the short, flapping character of the auricular, without being louder than is natural in a narrow-chested and meagre individual. The auricular sound is preternaturally loud, especially on the right side. The double sound is audible on the pulsation, and universally on the right side of the chest; on the left it is drowned, except immediately below the clavicle, by loud mucous râles. For the sake of brevity, I omit the stethoscopic signs afforded by the lungs.

Diagnosis.—Moderate dilatation of the heart, particularly the right auricle. Aneurism of the arch of the aorta. Chronic tuberculous consolidation of the middle lobe of the right lung, and a cavern. Elsewhere bronchitis. Less consolidation of the left lung, but bronchitis, with much obstruction. Is there a cavern in the superior lobe?

Prognosis.—Death very speedily. She died a week after.

Necrotomy.—*The heart* was rather smaller than natural.

Right ventricle.—Its cavity was scarcely as large as a walnut, and its parietes were extremely thin. The *right auricle* was double its natural size, and its parietes were extenuated. The *tricuspid valve* was so obstructed with cartilaginous nodosities as to perform its function very imperfectly.

Left ventricle.—Its cavity was diminished, but its parietes were upwards of half an inch thick. A few cartilaginous protuberances and osseous lamellæ were scattered over the mitral valve and lining membrane of the heart.

Aorta.—Its ascending portion and arch bulged out in an ampullating form, to three times their natural dimensions. The tunics were extremely thin, and the internal surface was stiff with osseous scales, and a yellowish, translucent deposition resembling cartilage. The aortic valves were natural, but the orifice was enlarged.

Lungs.—In the anterior part of the right lung was an extensive anfractuous cavern, bedded in a mass of blackish-green matter of great density, pervaded with tubercles, and yielding a sanious pus of intolerable foulness.

The left lung, particularly its superior lobe, was crowded with tubercles, but it had not attained such a density as to sink in water. No cavern. A copious

stream of bloody serum followed the incision of the knife. The bronchi were of an intense and permanent red colour.

In this case the form of the tumor was intermediate between dilatation and sacculated aneurism; and I suspected the existence of aneurism solely from the pulsation below the right clavicle; for, as the sounds heard on the right side of the chest were devoid of the rasping murmur which characterises aneurism, I imagined that they proceeded from the heart.

On seeing the state of the aorta, I was embarrassed how to account for the absence of the rasping sound and purring tremor above the clavicles; but the condition of the heart afforded a satisfactory explanation of the anomaly. This organ was so small, and the cavity of the left ventricle so contracted, that not more than half the natural quantity of blood was propelled at each systole, and its impetus was still farther diminished by the extreme debility of the patient; consequently, the current through the aorta was not sufficiently strong to occasion either sound or tremor.

The absence of pulsation above the clavicles appeared to be referable to the retraction of the heart and aorta, by the condensed and collapsed state of the lungs.

This case is instructive, as it evinces that, notwithstanding a favourable state of parts, the phenomena of sound and tremor are not developed unless the blood is transmitted with suitable velocity. Individuals, therefore, in whom the physical signs of aneurism are ill characterised, should be examined not only during a state of quietude, but also when the circulation is accelerated by exercise. Moreover, as it appears from this case that a certain degree of friction of the blood against the sides of the vessels is necessary for the development of sound and tremor, it is obvious why these phenomena are often inconsiderable in large, old aneurisms: for, as they are out of the line of the circulation, they are not exposed to the direct current of the blood, and their inexpandibility prevents the influx of much into their cavities. This observation, however, is restricted to those aneurisms which, either from being confined in an unyielding case, as the chest, or from the thickness and inelasticity of their parietes, have very limited capa-

bility of dilatation; for I have uniformly observed, that when the tumor is situated in yielding and resilient parts, when the sac is thin and elastic, and when the orifice from the artery is small, the sound and tremor, as well as the pulsation, are invariably very considerable. The most apt exemplifications of this remark are afforded by recent popliteal aneurisms; and the diagnosis of these affections is materially facilitated by auscultation, when, in consequence of the incipient state of the disease, or the thickening of the superincumbent soft parts, the pulsation is not perceptible to the hand, and the nature of the complaint is therefore obscure.

CASE VI.—*Sacculated Aneurism of the Aorta.*

Robert Falkner, 38, a soldier until recently, of athletic conformation, complains of a constant, deep-seated, gnawing pain with a sense of weight in the left clavicular and axillary regions, and extending thence over the shoulder to the scapula. An uneasy sensation pervades the side of the head, and descending to the arm, renders it so numb and feeble that he can neither raise it higher than the shoulder nor move his fingers with the natural facility. Above and below the left clavicle there is an extensive tumor; the second and third ribs are prominent at their sternal extremities, and the integuments covering them are livid. A pulsation is perceptible over the same extent.

The right jugular vein is turgid and varicose; the left is apparently without pulsation and turgescence. He is subject to paroxysms of cough, which excite dyspnoea, accompanied with violent pulsation of the tumor, but not with much palpitation of the heart. The dyspnoea often supervenes spontaneously, and its attack frequently occasions starting from sleep. He is incapacitated from swallowing solids by a pain lancinating from the summit of the sternum through the neck. His face is tumid, purple, and sometimes livid. Oedema and ascites, with which he was affected some months ago, have decreased, and the urine, usually scanty and high-coloured, is now almost natural. Pulse 90, natural. Sputa tinged with blood; morning sweatings; progressive emaciation. For three weeks he has been prevented from maintaining the recum-

bent position for more than a quarter of an hour at a time, by increase of pain and dyspnœa.

He states, that a year ago he was seized with a severe cough and acute pain in the chest, which were mitigated by venesection and a blister. A few days subsequently, during a fit of coughing, he was suddenly attacked with an excruciating pain between the left scapula and the spine, and with recurrence of a pain below the left clavicle, to which he became subject a year ago, in consequence of an injury inflicted on the part. This attack was instantaneously productive of extreme dyspnœa, and followed by bloody sputa, night sweatings, and progressive reduction of strength.

Stethoscopic exploration.—The pulsation is visible from the summit of the sternum to the left shoulder. The shock conveyed by the cylinder is powerful and double, as if from the alternate rising and collapse of the tumor. It has the same character on the right side of the chest, but is more languid and obscure. It decreases progressively on receding from the tumor towards the præcordial region, where the impulse of the heart is scarcely perceptible. Above the sternal end of the right clavicle, there is an abrupt grating sound, like that of rasping. Above the left clavicle it is weaker, as if remote: below both clavicles it loses much of the grating quality, and becoming feebler on receding from the tumor and advancing towards the heart, it is finally superseded by the ventricular sound. A clear, short, flapping sound, corresponding with that of the auricles, succeeds the grating sound, and is as loud at the clavicles as in the præcordial region, but weaker midway between these points; whence I am led to suspect that it proceeds in some degree from the aneurism*. A double sound, without grating, is audible between the left scapula and the spine. There is no purring tremor in any situation. The sound of both ventricles is louder than natural, and has the characters of the auricular sound. Pectoriloquy below the right clavicle.

Diagnosis.—Aneurism, probably sacculated, of the arch of the aorta, where it begins to descend. Dilatation of the heart. A cavern in the right lung.

* Other cases have subsequently corroborated this suspicion. The second sound accompanies the collapse of the tumor, and it is, therefore, probably occasioned by the reflux of the blood from the sac.

In this patient, the external manifestations of aneurism are so palpable, that, although I have not the certitude which is derived from dissection, I think I am privileged to record a case possessing so many interesting features. The excruciating pain, from which he dates the affection, was probably occasioned by rupture of the internal tunics of the aorta. The extent of the tumor, and its pulsation below the clavicles and under the sternum; the absence of purring tremor; the prominence of the second and third ribs; the lividity of the integuments, and the pressure on the brachial plexus of nerves, occasioning deficient motory and sensific power of the arm, indicate that the aneurism is of the sacculated species, of large dimensions, and of old formation. The signs which denote that the tumor occupies the left extremity of the arch, are, the dysphagia, the greater prominence and pulsation on the left side, extending even to the shoulder, and the gnawing or terebrating pain between the left scapula and the spine.

What is the reason that above the left clavicle, where the tumor and pulsation was greatest, the rasping sound was subdued, as if remote?

Is this referable to thickening of the sac with coagula of lymph? Several similar cases, of which the two subjoined afford examples, lead me to entertain this opinion.

[To be continued.]

FATAL CASE OF GUN-SHOT WOUND.

To the Editor of the London Medical Gazette.

SIR,

I BEG to submit to you a case that may be classed under the head of gun-shot wound, although inflicted by a piece of the lock driven off by the bursting of a fowling-piece, while the sufferer was engaged in a match of pigeon-shooting at the Red-House, at Battersea.

If you think the details worthy of a place in the Gazette, perhaps as perspicuous a manner as any in which they can be given will be by first inserting the interesting and intelligent letter which I received from Mr. Trinder, of Devizes, announcing the poor man's death, and the post-mortem examination, and then adding the extracts from

my reply to that gentleman, which give the scanty details of the few events which attended the early period of the accident.

I am, Sir,

Your obedient servant,

ROBERT KEATE.

August 29th, 1829.

Mr. Trinder's Letter to Mr. Keate.

Devizes, July 26th, 1829.

SIR,

IF I am correctly informed, you had several weeks since under your care the late Mr. Harrison, gamekeeper to Watson Taylor, Esq. of Erle-Stoke Park, near this town, who received a wound in the left arm from the bursting of his gun, whilst in London early in June last.

His case appears to me to afford so curious an illustration of the nature of gun-shot wounds, that I have thought you may feel interested in receiving a brief statement of the circumstances preceding his death, and the appearances on dissection. I saw the keeper about five weeks after he received the injury, being three weeks after he left London. During the first fortnight of his return to the country, he and his friends considered him going on favourably: he pursued his avocations as a keeper, and mixed in society; but I am informed that he complained of pain of the side below the left scapula, of oppressed breathing, and could only respire with any degree of comfort when his chest was supported by a broad belt.

On the Saturday, eight days prior to his death, after using greater exertion than usual, those symptoms became so much aggravated as to induce him to call in a neighbouring surgeon, and soon afterwards a physician of eminence, under whose directions the usual treatment was resorted to, with the view of arresting inflammation—and particularly large and frequent bleedings. Mr. Watson Taylor, hearing of his keeper's relapse, wrote to me from London, requesting I would see him, which I did on Sunday, the 12th inst.

On my arrival I found the keeper so oppressed and exhausted, that it was evident he was rapidly sinking: he died in six hours.

In conducting the post-mortem examination, I observed the wound in the arm was situated just below the inser-

tion of the larger pectoral muscle: it was not healed, but a probe would not pass more than half an inch. Upon exposing the lateral part of the chest, which was slightly emphysematous, after a minute examination, the only trace of lesion that could be observed was an irregularity on the surface of the sixth rib, about four inches from the spine, from which no channel of communication with the external wound could be discovered. The rib proved to be fractured, and though the broken ends were in exact apposition, they were still disunited. In the cavity of the chest were firm adhesions of the left lobe of the lungs to the pleura costalis, above the seat of fracture; nearly three pints of opaque serous fluid were contained, with a large admixture of flocculent purulent matter, of firm consistence, partly floating in the fluid, and partly adhering to the left lung, in the posterior part of which was a fragment of a gun-lock, measuring $2\frac{1}{4}$ inches long, $\frac{5}{8}$ ths of an inch broad, and $\frac{1}{8}$ th of an inch thick, penetrating the lung obliquely about $1\frac{1}{2}$ th inches: the rough broken extremity of the fragment protruded from the lung, appeared during respiration to have rubbed against the ribs, which exhibited an ulcerated surface. It was situated close to the heart, and in its passage to the lung it evidently grazed the pericardium to the extent of nearly two inches, the surface of which was still suffused with blood. The substance of the lung exhibited no indication of disease, not even the part penetrated by the fragment of the lock. In making this communication, I have abstained from troubling you with any comments of mine. Should you consider it a case of sufficient interest to communicate to the profession, I shall be happy to afford you further information if you require it, and shall feel obliged if, at your leisure, you will favour me with any observations you may have made whilst the patient was under your immediate care.

I have the honour to be, Sir,

Your obedient servant,

CHARLES TRINDER.

Extracts from Mr. Keate's Reply to Mr. Trinder.

On the 12th June, 1829, I was called in to see — Harrison, (a remarkably fine-looking, stout man, 30 years of age,)

about two hours after his accident. The situation of the wound, nearly at the point of insertion of the pectoralis major, in the left arm, has been accurately described in your obliging communication.

I introduced my finger into it, and traced it round and under the bone as far as my finger would reach, and felt no termination of the track. I saw the remains of the gun-lock of which the piece was deficient, and as there was no apparent possibility of its exit, I concluded that it passed down to that spot where in certain positions of the body he felt uneasiness; namely, near the angle of the sixth rib; but so slight was this uneasiness, that he would not believe, and never could be convinced, that the foreign body had entered, and was remaining there. I certainly could not ascertain by any trial that there was a fracture of the rib, and it was the impression on my mind, that the piece of iron had been driven under the latissimus dorsi, and had become impacted in the intercostal muscles at the situation where you describe it to have been found.

There was very little bleeding from the wound; but on the 13th and 14th, there was considerable tumefaction over the upper parts of the biceps and of the deltoid.

Pain of the side increased on the evening of the 13th, attended with dyspnœa, which was relieved by a very copious bleeding*: on the following day there was a return of symptoms, with violent perspiration and considerable constitutional disturbance. He was, therefore, again bled to an extent that relieved these symptoms, and which never recurred.

From about the fourth day the wound became clean, suppuration advanced favourably, and the healing process went on rapidly.

A roller had been applied round the thorax, which relieved him at first, but he could not bear its uniform and constant pressure. I therefore used a broad belt, with straps and buckles, so that he could himself adapt its tightness to his own feelings and comfort.

He soon afterwards felt so well as to become impatient of restraint, and I had, in fact, some difficulty in preventing his going to a match of pigeon-

shooting about the end of the first week or ten days.

At length, contrary to my advice and opinion, he determined to return to Wiltshire. I took great pains to convince him of his danger, and he promised immediately on his arrival to consult Mr. Watson Taylor's medical friend there, and to request that he would favour me with any communication respecting him.

I was restrained by peculiar considerations from urging more strongly his stay in London.

I had no communication from him after he left town, and it was only from accidentally meeting the gentleman at whose house I had seen him, and inquiring about him, that I heard, a day or two before I received your letter, of the poor man's death. I could learn no particulars, and your statement has, therefore, been doubly interesting to me. I am inclined to suspect that the fracture or disunion of the rib may have been a secondary effect of absorption or ulceration from the continued contract and friction of the iron; but you are more capable of deciding this point from your inspection of the part. The median nerve had evidently been injured, as evinced by the effects on the hand and fingers.

R. K.

MEM.—In a note subsequently received from Mr. Trinder, he says, "the disunion of the rib must have been from fracture, and not from absorption; the broken ends were in close and exact contact; the fracture was rather oblique."

One most remarkable thing in this case is, the absence of any trace by which the piece of iron entered the thorax, so as to wound or graze the pericardium; and how it could have been reflected from that membrane backwards and downwards into the posterior surface of the lung, apparently without passing through its substance, is to me inexplicable. No aperture, in fact, into the chest seems to have been detected at any part, and it is as remarkable that the incessant friction of a piece of iron on the pleura should have left him for one moment free from acute inflammation of that susceptible membrane.

* He had been bled to about sixteen ounces before Mr. Keate saw him.

NEW STETHOSCOPE.

To the Editor of the London Medical Gazette.

SIR,

A COMMUNICATION that has for its object to facilitate in some degree the diagnosis of diseases, being, it is presumed, not unacceptable to the editor of a medical journal, I take leave to trouble you with a description of a modified stethoscope, that has been successfully used in the Royal Infirmary, which you can favor with publicity, should it appear sufficiently important.

The writer, however, of this paper apprehends, *in limine*, that the intimations of a student, tending to question the perfection of, perhaps, the most important invention which has been presented to the medical world, since the discovery of Jenner, might excite prejudice against his suggestions or censure for his presumption. He would not, therefore, have had the hardihood to obtrude this letter, had not others, as well as himself, been experimentally satisfied of the truth it details. Having been convinced of the pathological and practical utility of the stethoscope, he has much regretted the great difficulty of attaining the accurate knowledge of which it is the medium of communication, notwithstanding the numerous cases of thoracic disease that have been treated in the Royal Infirmary. This difficulty arises from the great number of medical students who prosecute their studies in Edinburgh; and who, from their anxiety to attain facility in auscultation, are often denied permission to use the instrument, in consequence of the torture unavoidably inflicted by repeated attempts, and by the frequent changes of posture necessarily required of the afflicted patients.

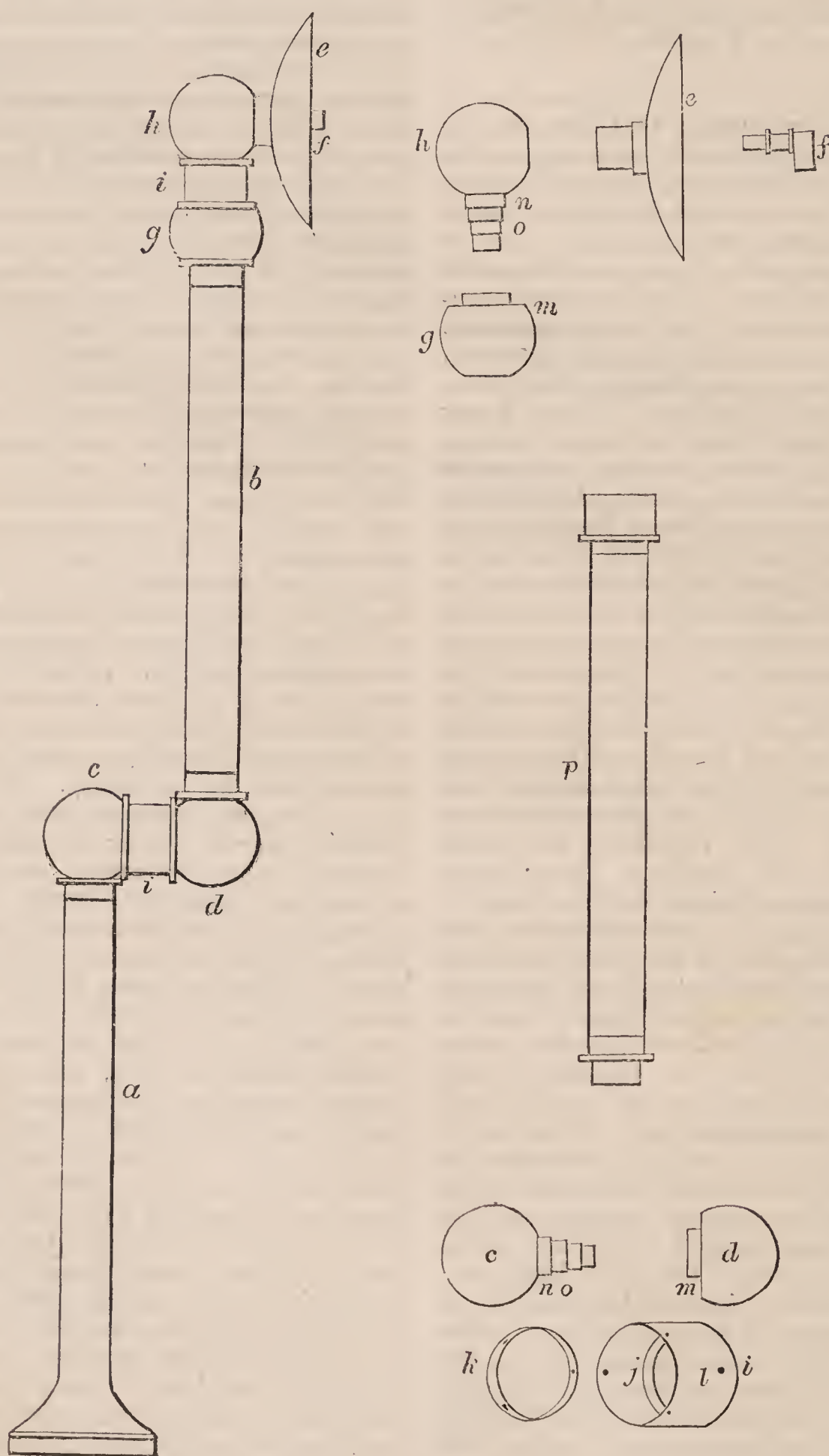
To alleviate the sufferings of the sick, (aggravated by the application of a timber cylinder, interposed between the diseased thorax and the closely applied head of the examiner;) and with the exception of the portion in contact with the bed, to enable students to explore any part of the chest, in any position, and in any stage of disease, without pressure or inconvenience to the patient or to himself, are desiderata of the discovery of which humanity must approve. These objects the writer has

attained, by means of a stethoscope, of which he sends herewith a drawing.

It consists of two tubes, (*A, B*), each 7 inches in length, and 5-8ths of an inch in diameter, except at the part to be applied to the thorax, where the diameter of the aperture is an inch and a half. These pieces are united by a perforated joint, (*C, D*), three inches in length, at right angles to their extremities: and the two pieces of which the joint consists, being united like the joint of a flute, permit the limbs of the cylinder to form any angle. The upper end of the instrument is provided with an ear-piece, (*E*), sufficiently large and concave to envelop the ear. Its central portion (*F*) being angular and moveable, admits the extremity of the cylinder as nearly as convenient to the meatus auditorius externus. The ear-piece can, by means of a moveable joint, (*G, H*), be placed laterally with respect to the extremity of the tube. The moveable joints, (*C, D—G, H*), were they formed of brass, could, by a simple contrivance, be rendered in any position air-tight. But as this, and perhaps every substance that would deviate from the homogeneousness of the cylinder, would injure the sound, external securities are necessary. The following has been devised: each joint is covered by a metallic ferrule, (iii) 5-8ths of an inch in length, and 6-8ths of an inch in diameter, except at one extremity, (*J*), where it is reflected inwards, at right angles, and where the diameter decreases about 3-16ths of an inch. Within the ferrule, and in contact with the reflected extremity, is placed a small flat ring, (*K*), which is secured through an aperture in the ferrule, (*L*), at three points, to one side of the joint, (*M*.) The other end of the ferrule is screwed also at three points to the other side of the joint, (*N*). The ferrule, and the inclosed ring, are by this contrivance permitted each to move freely with respect to the other; while with respect to the joint, they preclude the possibility of its opening, or of its not being air-tight. Should friction, however, eventually cause it to become too free, the screws can be withdrawn from the pieces, (*D, G*), and by means of silk coiled in the depressions, (*O, O*), the joint can again be rendered air-tight.

The piece of ivory that is screwed to the lower extremity of the cylinder is externally somewhat concave, in order that it may be more advantageously ap-

plied to the thorax. The ivory fer-
rules, and the pieces to which they are
screwed, are each marked with cor-
responding circles.



The instrument is, in a word, a bent tube; but becomes, if the comparison be allowable, like the 5th book of geometry, somewhat difficult by description.

The following are the advantages it

affords. It conveys at any angle distinct thoracic sounds; it can be used perpendicularly to any point of the chest, but the angular form precludes the inconvenience of pressure. The auscultator can use it in the sitting posture, with his

head seldom deviating from the erect position, and in some cases without disturbing the patient while asleep. As it does not require the head of the stethoscopist over the chest of the sick person, and as another tube (*P*) can be screwed to the instrument, it can be used in the highest ranks of society without offending fastidious delicacy. Every portion of the thorax, except the part in contact with the bed, can be explored while the patient and the feet of the examiner remain at rest. Should the patient assume the sitting posture, though his bed be accessible at only one side, every portion of his chest can be explored with perfect ease to both parties; and, with a longer stethoscope, the auscultator can explore any portion of his own thorax.

The screws being of the same size, the instrument can be lengthened or shortened at pleasure. The third tube is otherwise useful. Timidity or disgust is unpardonable on the part of a physician when engaged in the discharge of his duty. But as it is often necessary in contagious diseases to explore the chest of the poorest individuals, may not reasonable precaution, and the feelings of a gentleman, be so far complied with as to use the cylinder with the additional tube, in cases manifestly contagious or miserably wretched? Finally, with a view to portability, it is not necessary to disjoint the instrument, unless the third tube be employed, as the limbs in a parallel position with the tube interposed, become conveniently portable in a small case or bag.

Except in the case of one patient, who, from repeated explorations with other stethoscopes, was terrified at the proposal to submit to auscultation, it has for some weeks been successfully used in every case of thoracic disease in the Royal Infirmary. It has, however, been objected (but what has not been objected to?), that the auscultator could more conveniently suffer his head, with the inflexible instrument, to be raised and depressed by the diseased chest of the afflicted patients, than retain the flexible instrument *in situ* by means of two fingers at each—often at only one extremity; but this opinion has not been maintained.

It has been objected that it cannot, *à priori*, be expected that sounds reflected from angles, could equal, in loudness and clearness, sounds conveyed

through a straight tube. But reference to the opinions alluded to, will have reminded those who entertained this idea that the objection is scientifically invalid. It was admitted, however, after accurate and protracted examinations, that the sounds conveyed by the new were equally loud and clear as those conveyed by the old instrument. It was originally expected that hard substances should, *à priori*, be preferred for the formation of stethoscopes. But every person knows that some of the phenomena of sounds are inexplicable by our present knowledge of acoustics.

It has been objected that the flexible, not being so simple as the inflexible stethoscope, the latter ought to be preferred. Simplicity in the construction of instruments should doubtless be ever held in view; but too much is often conceded to abstract terms, and the tube admitting only of so much flexion as convenience requires, it cannot be said that it deviates unnecessarily from simplicity.

These are the principal objections that have been advanced: others, perhaps, will have been suggested. But little that will bear examination can, it is presumed, be urged against it. To all its opposers, how prejudiced soever against innovation, the writer respectfully asserts that it requires only "*fair play and no favor.*"

Laennec's, like almost every other invention, has been opposed; but the quick sale of his works proves that his discovery, like that of Jenner, necessarily and rapidly overpowers opposition. The auscultator is, in almost every case, unembarrassed by the fallacy of symptoms; and it has been proved that the stethoscope, in many cases, accurately guides, not only with respect to the "repetition, increase, and diminution of remedies," but that it is often indispensable in pneumonia, pleuritis, bronchitis, measles, scarlatina, croup, fever, confluent small-pox, latent catarrh, phthisis, diseases of the heart, hydrothorax, doubtful cases of pregnancy, &c. It has been shewn also, that it affords to the surgeon most important information, previously to deciding on the operations for empyema, or for the extraction of foreign bodies from the trachea; in detecting hæmorrhage into the pleura; in ascertaining the state of the lungs previously to the operations for cancer of the breast, caries of the

ribs, white swelling, &c. &c.; in the diagnosis of certain fractures, aneurisms, &c. Its utility may be attained with more facility than many believe; and who that is not destitute of humanity and of justice, will not, by the acquisition of this knowledge, avoid the remorse, and perhaps the exposure, attendant on the discovery that the death of a fellow creature was attributable solely to neglect?

Should it be generally admitted that the flexible, *cæteris paribus*, conveys sounds only equal in loudness and clearness to the inflexible instrument, the object of the writer will have been attained. Patients in hospitals, should the modified stethoscope be employed, will, it is presumed, urge much less objection to exploration, and will therefore present greater facilities for acquiring perfection in the use of the cylinder.

It is surprising that the discoverer of mediate auscultation had not suggested a flexible instrument. But Laennec, like the immortal Archimides, grappled with great ideas in unexplored regions of thought. Contented with the acquisition of all the knowledge attainable by the stethoscope, he despised the drudgery connected with the minutiae of mechanical invention; directed his thoughts to great pursuits; and permitted the instrument to be modified by the humblest labourers in the field of science.

It has occurred to the writer that both ears might be simultaneously and advantageously employed in stethoscopic examinations. The instrument adapted to this purpose consists of a tube, connected at its middle at right angles to the cylinder, to be applied to the patient, and connected at its moveable extremities to two tubes, moveable also on the principle that has been described. It admits of easy adaptation at once of the patient, and to both ears.

These deviations from the original cylinder would doubtless have been long since effected, had any person inquired of what modification does the inflexible stethoscope admit. Should they facilitate the attainment of so important a study as auscultation, it will afford much satisfaction to

Your most obedient servant,
NICHOLAS P. COMINS.

Edinburgh, Aug. 12th, 1829.

ULCERATED CANCER—CURED.

To the Editor of the London Medical Gazette.

Hull, August 23, 1829.

SIR,

I AM not aware that there is at present on record a case of ulcerated cancer which has been cured, either spontaneously or otherwise: and though the following may prove only an exception to the general experience, yet, I presume, it is not unworthy of the attention of surgeons, even as a solitary instance of success in a complaint hitherto deemed incurable. Future trials alone can determine the value of the treatment employed. I was led to the use of the chlorine, in this instance, from having lately seen effects from it in several cases of very deep and extensive old ulcers of the legs, under my care in the Infirmary here, which have agreeably surprised me; two or three of these, which came in for amputation, having been rapidly and completely cured. And I was induced to employ it also with a view to destroy the peculiarly horrible foetor with which open cancer is always accompanied.

I am, Sir,
Your obedient servant,
GEORGE FIELDING.

Mrs. C—, æt. 81, June 1st, 1829. She informs me that, for upwards of fifteen years, she has had a complaint in the right mamma. Without any known cause, she first discovered a small tumor within the breast, near the nipple; it very slowly and gradually enlarged, retracted the nipple, and puckered the integuments; she had not constant, but occasional severe darting pains; these most commonly came on in the night, when they awoke her from sleep. She has been several times ill during this period, and has had medical advice, but did not mention the complaint in her breast. About five weeks ago she slipped and fell, in the house; hurt her right hip, and “shook” herself a good deal. Soon afterwards, the breast began to give more pain, and distressed her so much that she was induced to shew it to the attending physician and surgeon, who have prescribed up to the present period. For some time previous to the accident, cracks and small openings formed in the in-

teguments, which discharged a thin bloody fluid. There is now an ulceration extending from the outer edge of the pectoral muscle within the axilla, towards the inner edge—say about four inches in length, and from an inch to two inches in breadth. The broadest part is about the situation of the nipple, of which there is not a vestige remaining. The ulcer here is a very deep excavation, as if the whole middle part of the gland had sloughed away. The edges of this extensive ulcer are ragged and irregular, in some places hanging over, and in others everted; a lurid blush of different breadths surrounds the whole of the edges, but I discover no disease in the neighbouring lymphatics. The general aspect of the ulcer is of a foul ash colour, except at the outer edge of the pectoral muscle, where there are a few red points. From the state of the cloths removed, the discharge from it, which is thin and pale, must be very considerable, and has the peculiar foetid odour of this kind of ulcer. The odour is distinguishable on the stair-case, long before entering the room, notwithstanding great pains have evidently been taken to obviate it. Countenance pale and bombycynous; tongue clean; pulse very little above the natural standard. Complaints of restless, feverish nights. Bowels are kept regular. The old lady says the dreadful smell deprives her very much of appetite, as every thing she takes is offensive to her. Her friends were told that the case was nearly hopeless; that all that could be promised was to soothe her, and counteract the horrible foetor, which was as distressing to her attendants as to herself. I directed the carpet to be removed, a mild diet, some common febrifuge, and the following:

* R Coninæ, gr. vi.

Ext. Conii. gr. xxiv. M. div. in pilul. xij. s. pil. ij. om. nocte.

R Solut. Chlor. Calcis, ℥ij.

Aquæ. Fontanæ, ℥vi. ft. Lotio. Lint dipped in the lotion to be applied over the ulcerated surface, and to be kept constantly moist.

8th.—Ulcer looks much the same, except at the lower side, where the lurid edge has extended every way. This portion of gland and integument is condemned. Has rested better, and is delighted that the offensive smell is removed by the use of the chlorine.

14th.—The remedies have been continued regularly. The ulcer generally looks cleaner; the edges are not so ragged, but the lower part is in a state of sphacelus, and will drop off. Complaints of restless nights, but is not feverish. A moderate opiate substituted for the conium at night.

22d.—Ulcer looks much cleaner every where (except at the lower side); red, healthy granulations in various parts, particularly in the axilla, where there is a patch of healthy-looking surface. Sleeps pretty well, and takes sufficient food.

July 2d.—Up to this time the appearance of the ulcer has gone on gradually improving. A small cicatrix has formed in the axilla and at the edge of the pectoral muscle; the upper edge is much flattened, and the lurid redness has nearly disappeared at that part; throughout, good granulations are arising, except at the lower side, where the gland and integument, nearly an inch in depth, and of considerable extent, are gangrenous; but there is a line of separation formed, which looks pretty healthy. Eats and sleeps well. Opiate continued at night, and the following ordered to be taken in the day:

R Tinct. Coninæ, ℥iss.*

Aquæ Menthæ, ℥vj. s. 6 part. ter die.

July 6th.—The mortified portion on the lower side has principally dropped off, leaving a deep and foul excavation, but the corresponding edge of the integument looks healthy. Cicatrization going on from the outer edge all round the upper and inner sides of the ulcer. Sleeps well; general health and appearance improving.

July 14th.—The whole of the blackened parts are removed, and healthy granulations are now fast filling up the cavity, the lower edge approximating them being much flattened. In every other part of the ulcer cicatrization is proceeding rapidly.

Aug. 4th.—In a few days after the last report, the inferior edge of the ulcer and the granulations from its base approximated, and cicatrization went on rapidly all round. There is now only an ulcer, about the size of a half-crown, in the middle. The general health and appearance are much improved; walks from room to room, and is free from complaint, except a little

* The tincture we use contains four grains to one drachm of spirit.

* How is this prepared?—E. G.

dyspnœa, which she says has come on the last two or three nights, upon lying down. It was my intention to establish an issue, provided the ulcer went on healing, before complete cicatrization took place; and, upon inquiry, I learnt that she had an issue made about "a certain age," which she healed up many years ago. For the relief of the dyspnœa, a blister was put upon the left side of the chest, and an issue placed in the right arm. Omit the opiate, and continue the conine.

13th.—By these means the dyspnœa was removed in two or three days. The ulcer is now entirely healed, and the cicatrix has a healthy, natural appearance, free from crust or deposition. The old lady seems in good health for her years—having entered her eighty-second year about a month ago. Throughout the whole of the process of sloughing the lotion prevented all fœtor, and, as it gave not the slightest pain, was continued until the whole was cicatrized.

Several times during the cure, a slight erythema appeared upon the surrounding sound skin, which was always speedily checked by the application of warm brandy.

of Mr. Hammond, the druggist, at Dartford. He was most dangerously ill. The skin was covered with an eruption of a dusky hue; the nostrils excoriated by the acrimony of the discharge; the greatest difficulty in swallowing any thing; low delirium, with a very rapid pulse: in short, every symptom of approaching dissolution.

In this state he began to take the chlorine in the evening, one drachm in half a pint of distilled water. The nurse was directed to give him as much as she could prevail on him to swallow. On visiting him the following morning, there was an evident amendment, and in twenty-four hours he appeared out of danger. Encouraged by this favourable case, and having many more opportunities of employing the chlorine, we gave it to patients of all ages; and we can most solemnly declare, that it proved successful in almost every case in which we were called in time, and in which the medicine was faithfully administered.

It possesses one very great advantage over most other medicines, which is, that children will generally take it without difficulty.—We remain, Sir,

Your obedient servants,

TAYNTON & WILLIAMS.

Bromley, Kent, 25th Aug. 1829.

ON THE USE OF CHLORINE IN SCARLATINA.

To the Editor of the London Medical Gazette.

SIR,

As you thought our communication respecting the employment of the belladonna as a preventive of scarlatina worthy of insertion in your valuable Gazette, we will now trouble you with some observations on the use of chlorine as a most important medicine in curing the disease. We are more particularly induced to make this communication by the request of a correspondent in your last number, "who wishes to know the result of your own experience, and that of others, of the powers of ammonia in the treatment of scarlatina." At the time the disease was raging severely in this neighbourhood, a medical friend requested us to give a fair trial to the chlorine. At the moment, we were attending a boarder at the school (mentioned in the former letter), a son

LEAVING THE BODY FOR DISSECTION.

To the Editors of the London Medical Gazette.

SIR,

YOUR "Friend of Science and Humanity," in the Gazette of the 15th ult. has dealt somewhat in the oriental style, and I do not think it would be right in me, a professed lover of plain facts, to permit so important a paper as his "Address" to reach its ultimate destination, unproved, or unaccompanied with a qualifying caveat. The gentleman intended, no doubt, through the medium of your widely-circulated journal, to submit his "brief essay" to the perusal of the profession: he knew that it would thus come before the eyes of "parliament" with double effect, having the stamp of tacit approval upon it, or perhaps after having received

some friendly hints for its amelioration. For my part, Sir, I regret that my leisure will not permit me to review the whole paper: it professes to be drawn up in a popular form, and the writer certainly deserves credit for his industry and zeal; but I must leave it in other hands: I shall only endeavour to relieve my conscience by correcting *one* glaring misstatement, which it would be unpardonable to let pass unnoticed.

In the latter part of his "Address to both Houses," the "Friend of Science and Humanity" is pleased to be particularly severe upon *certain persons* in a *certain part* of the kingdom, who, by a *solemn declaration*, had *devoted* their bodies to dissection after death, out of a most *silly motive*, having "swallowed the bait" of their bantering and insidious opponents, and entertaining expectations from the measure of the most absurd and ridiculous kind. Can the writer really mean the celebrated document which Dr. Macartney drew up in the Dublin University School of Anatomy last year? I should be much inclined to doubt the fact, did I not find it to be the impression left on the minds of some of my friends who have seen this "Address"; and, in that case, I must beg to inform your "Friend," that he does not appear to entertain the most distant idea of the meaning of the document in question: he cannot have read it, or if he have, it must have been with the most unaccountable inattention, or the most singular perversion of understanding. And heaven knows, it could not be for want of opportunity to see it. It has been published—since it first appeared in the Medical Gazette, (No. 21)—in every newspaper, and in almost every periodical in the kingdom; it is inserted in the Parliamentary Report of the Committee of Anatomy; and, finally, it was given in a late number of the Westminster Review, accompanied by a highly laudatory comment. Now, although I am persuaded that a simple perusal of that "solemn declaration," as he calls it, will induce the "Friend of Science and Humanity" to expunge the erroneous report and unwarranted strictures relating to it in his "Address," it may not be improper briefly to undeceive his readers, and to show how lamentably he has fallen into error.

The document to which he alludes is *not* a solemn instrument, or bond, or

bequest; it simply expresses a wish that the body after death should be converted to a useful purpose, with the consent of friends, and with all due regard to feelings and prepossessions. It was *not* got up with the *silly design* of concession or compliance with the humours of any set of individuals; its intent was, and is, to protest against ignorance—to do away with prejudice and superstition—and to set a spirited example to the public at large. Nor is there one word in it expressive of any such design as that of supplying the school of dissection with the bodies of medical men.

Having thus manifestly misunderstood and misstated both the nature and object of the *solemn declaration*, our "Friend" must allow, that all his fine consequences and moral arguments on motives, rights, and obligations, fall to the ground senseless. Let me once more beg of him *to read* the document, and when he has done so, let him connect with it the following piece of information:—There are now upwards of 300 signatures affixed to Dr. Macartney's solemn declaration, and of these, two-thirds, at least, are non-medical. The readiness with which persons of every profession and rank have come forward to sign it—unsolicited and unasked—forms a striking feature and a redeeming trait in the character of the times.

I am, Sir,

Your obedient servant,

PHILALETHES.

Dublin, August 20th, 1829.

LITHOTRITY.

To the Editor of the London Medical Gazette.

SIR,

IN your No. for August 29th you have the following words:— "We have spoken of M. Civiale, throughout these remarks, as the true inventor of lithotritry: such is our persuasion. He was indisputably the first who made known to the public the possibility of performing such an operation; whether he was the first who thought of its feasibility, we will not decide: but, be it remembered, that it was not until he had *published* his experiments that other competitors for the honour of the invention made their appearance."

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In the 59th No. of the *Edinburgh Medical and Surgical Journal*, for April 1819, is an account of an instrument for lithotomy, with an engraving, by Mr. John Elderton, at that time house-surgeon to the General Infirmary, at Northampton. In principle, the instrument was very similar to those now in fashion; but as the curvature of a catheter was at that time supposed indispensable, the difficulty of contrivance was much increased: any one who refers to Mr. Elderton's description and to the engraving will readily see how dexterously the difficulty was overcome; and, though I do not mean to deny the superiority of M. Civiale's apparatus, I contend that the priority of invention is decidedly due to our countryman. The model of Mr. Elderton's instrument was exhibited to several of the most eminent surgeons of London in 1818 and 1819, and met with their approbation, but I am not aware that the instrument itself was ever used on the living subject.

In justice to a very industrious and ingenious surgeon, I take the liberty of requesting your insertion of these remarks.

Your obedient servant,
C. L.

London, August 31, 1829.

ANALYSES & NOTICES OF BOOKS.

“ L'Auteur se tue à alonger ce que le lecteur se tue à abrégér.”—D'ALEMBERT.

The Influence of Climate in the Prevention and Cure of Chronic Diseases, more particularly of the Chest and Digestive Organs: comprising an Account of the principal Places resorted to by Invalids in England and the South of Europe, a Comparative Estimate of their respective Merits in particular Diseases, and general Directions for Invalids while travelling and residing Abroad. With an Appendix, containing a Series of Tables on Climate. By JAMES CLARK, M.D. Member of the Royal College of Physicians of London, &c. &c.

DR CLARK is well known to the profession as the author of a useful little work on the climate and medical institutions of France and Italy.

The subject of climate, as influencing disease, is under all circumstances one of much importance; but to the inhabitants of a country where the heavens are proverbially fickle, such inquiries become doubly interesting. Many of our diseases are doubtless the offspring of our climate; and many others, if they do not arise from it, are at least aggravated by its inclemency. Phthisis, scrofula, and rheumatism, are among the most unexceptionable illustrations.

“Change of air,” as it is called, has long been a favorite remedy for various ailments; and even on a limited scale such change is often marvellously efficacious. Witness the improvement of the smoke-dried cockney, who, leaving his cares behind him, proceeds by the “steamer” for a few weeks to Margate; or the fallow lounge of Bond-street, who, when the season arrives at which it would be an irrevocable blot upon his reputation to be seen “in town,” disappears, to breathe for a time the purer atmosphere of Brighton or Cheltenham.

A mode of life more prejudicial to health than constant residence in any large city without freedom of air and exercise cannot well be imagined; and we agree entirely with the observations of our author, who describes its effects in this metropolis under the name of *cachexia Londinensis*. If it be merely under this malady that he labours, it will matter but little where he goes, so that he but leaves the “city of the plague.” But if he be affected with any more formidable malady, the choice of his new abode becomes of importance: for one an elevated situation is requisite; for another a sheltered spot and milder air. This kind of discrimination has certainly been too little attended to; and here the work before us fills up the blank in an efficient manner.

Another benefit springing from change of climate is the act of travelling. There is in mere motion, but above all in rapid motion, something inspiring, which often has a great effect in removing functional disease. The effect of constant change of scene, and the state of excitement in which the patient is thus kept, have been well described by our respected contemporary of the *Medico-Chirurgical Review*, who has spoken of them with a degree of animation which no one could do who had not felt

them. Still too much is not to be expected from the change, even with the assistance that travelling affords, and certainly the climate of Italy would need to work miracles to do all that has been, and often is expected of it. How often have we seen patients in confirmed phthisis hurried off to Italy—to die.

Before, then, we travel abroad, let us hear what Dr. Clark has to say concerning the climate of our own country, particularly the southern coast.

CLIMATE OF VARIOUS PARTS OF ENGLAND.

Hastings is protected in a great measure from the north and east winds, while to the south-west it is fully open; in fact, it is almost completely hemmed in upon the sea by the hills which arise behind it. It is chiefly during the months of January and February that it is to be preferred, being then warmer, and more sheltered from the prevailing winds, than any other place on the south coast. Dr. Clark thinks it unfavourable for nervous complaints, or persons of relaxed habit.

Brighton has a dry, elastic, and bracing air; in these respects differing considerably from *Hastings*. The most favorable season is autumn and winter, at which times the climate is more steady than that of *Hastings*. The least favorable part of the year is spring, owing to its exposure to the north-east wind; and during this time it is, of course, very unfit for patients labouring under pulmonary affections.

Isle of Wight.—The whole of the Undercliff is dry and free from deleterious exhalations, while it is sheltered from the north, north-east, and west winds; and on this part of the coast, according to Dr. Lampriere, the climate is as favourable to the invalid as any part of England. Undercliff embraces a spot of country not above six miles in length, and from a quarter to half a mile in breadth.

Torquay is drier than most places on the south-west coast, but still the climate is soft and humid. It is remarkably protected from the north-east wind, and this protection extends over a considerable tract of the neighbouring county.

“The climate of the coast of Devonshire is found very beneficial in various forms of disease. I have known it serviceable in chronic affections of the

throat, trachea, and bronchia, proceeding from irritation, or a low degree of inflammation of these parts, and attended with a dry cough, or with little expectoration; likewise, in an irritable or morbidly sensitive state of the stomach, and in hypochondriacal affections, the consequence of such a state. In dysmenorrhœa and all nervous sympathetic affections dependant on that disorder; in a highly sensitive state of the nervous system, and in most diseases of general irritation, advantage may be expected from this climate. On the other hand, it certainly exerts an unfavourable influence on nervous headaches, and on all nervous complaints arising from relaxation, or want of tone of the nervous system; it is injurious also in pure dyspepsia, when the tone and sensibility of the stomach are below par, as indicated by pale lips, a pale clammy state of the tongue, and languid circulation; and it will be found no less unfavourable in menorrhagia, in leucorrhœa, and all diseases accompanied with much general relaxation of the system, or with much discharge from the affected organs.

“What may be the real estimation in which the climate ought to be held in consumptive complaints, and what may be its absolute effect upon these, I have much difficulty in saying; but this much I may venture to advance, that as the invalid will be exposed to less rigorous cold, and for a shorter season,—will have more hours of fine weather, and, consequently, more exercise in the open air,—he gives himself a better chance by passing the winter here, than he could have in any more northern part of our island. To compare it, also, in this respect, with the climate of the southern continent of Europe, is no easy task. In the south, the invalid has finer days, a drier air, and more constant weather; but the transitions of temperature, though less frequent, are more considerable. In the nights, I believe, invalids are often exposed to severer cold than here; and this arises partly from the great range of temperature, and partly from the imperfect manner they are protected from the cold of night, by the bad arrangement of the houses, chimneys, &c.”

Penzance.—The climate of this place is very peculiar—the mean annual temperature being only 1° -77 above that of London; yet it is $5\frac{1}{2}^{\circ}$ warmer in winter and 2° colder in summer, so that

the distribution of heat throughout the year is very different at the two places. Nearly twice as much rain falls at Penzance as at London. The winds are both frequent and severe, a circumstance which constitutes the great disadvantage of the climate. Dr. Clark is of opinion that the consumptive cases in which the soft humid air of Penzance is likely to be of use, are those in which there is "an irritated state of the mucous membrane of the lungs, producing a dry cough, or one with little expectoration." In certain bronchial diseases, and in pure asthma, it is also said to be sometimes very beneficial.

West of England.—The temperature of the different places in the west is rather lower than of those of the south. The mean annual temperature of Cheltenham is about a degree above that of London. Bath and Bristol are nearly 3° warmer than London during the months of November and December; while in January and February they are not 1° warmer. In March, Bath and Cheltenham are colder than London. After alluding to the opinion of various practitioners, our author continues—

"From all these testimonies in favour of the climate of the more sheltered parts about Bristol and Clifton, there appears sufficient evidence of this spot being the mildest winter, and more especially spring residence, in the west of England. This results also from its sheltered situation, and the evidence afforded by our meteorological registers, which, we have seen, make Bristol warmer than the south coast, and equaling that of Devonshire during the spring months. This country affords a good summer climate; so that for invalids to whom the air of this district is suitable, it presents altogether one of the best residences throughout the whole year in our island. The valetudinarian should seek the lower and more protected situations about the Hotwells during the winter and spring, and the more elevated places on Clifton Hill in the summer; or a change to the more interior parts of the country, as to Cheltenham, or still better, to Malvern, may be in many cases advisable. In other cases, the summer months may be passed in South Wales; and in such chronic complaints as a course of goat's whey promises benefit, this will be the best place. But the preference to be given to either of these situations must

of course depend on the nature of the individual case. It may, however, be stated, that when a change of air can be made during the summer months, it will generally prove beneficial to the invalid; although the amount of benefit will depend, in a great measure, upon the fitness of the summer residence selected."

CLIMATE OF VARIOUS PARTS OF FRANCE.

The different parts of France resorted to for the climate are the south-east and south-west provinces; the latter resemble the corresponding situations in England, the former are entirely different.

The west and south-west of France comprehends the whole tract of country from Brittany to Bayonne. The mean annual temperature is about 55°, being 6° above England in general, and 4° above the warmest parts of it; but 3° below the south-east of France, and 4° below Italy. The climate, upon the whole, is soft, relaxing, and rather wet; it was regarded by Laennec as very favourable to consumptive patients, and indeed, according to him, the number of such cases found on the coast of Brittany is comparatively small. It is chiefly in chronic inflammatory affections of the mucous membranes that a residence in the south-west of France is beneficial; and those who like the climate of Devonshire will also be pleased with this. Pau appears to be one of the most eligible places in this district for invalids of the description alluded to. It is finely situated on a ridge of gravelly hills, with the Pyrenees rising gradually behind. Some of the mineral waters of these districts are also very beneficial, and it is easy for the invalid to pass the winter at Pau, and return to the watering places in spring. He ought not to be later than the end of September in arriving at Pau, nor to leave it before June.

L'Orient, Nantes, La Rochelle, Bordeaux, Montauban, and Toulouse, as well as Pau, belong to the south-west division.

The South-east of France was until lately regarded as particularly favourable for consumptive patients, who, accordingly, used to be sent there in great numbers; "but nothing (says Dr. Clark) can be more unaccountable than how such advice ever came to be given."

The temperature of Provence generally is about 7° above that of the south-west of England; but then the heat is very unequally divided, for its winter temperature is only 43° —that is, not more than $1\frac{1}{2}^{\circ}$ above that of Devonshire. The difference between the coldest and warmest season is 35° , while in the south-west of England it is only 22° . Dryness is the peculiar characteristic of Provence; in fact, it is the driest district in Europe, giving a bare and parched aspect to the country.

The general character of the climate, therefore, is “dry, harsh, and irritating,” and it is thus decidedly unfit for consumptive patients, but answers well with those of torpid habit and gloomy disposition, and with whom a moist and relaxing atmosphere disagrees.

At *Montpelier* it appears from the medical topography of M. Murat, that about one-third of the whole number of deaths at the Hôtel Dieu of this city was from consumption.

Marseilles is open to the full influence of the cold winter winds of the district, and is indeed “one of the towns in France in which pulmonary consumption is most prevalent.”

Aix is, if possible, worse than the preceding; its extreme annual range of temperature being no less than 83° , and its inhabitants very subject to pulmonary diseases.

Hyeres, a little town about two miles from the shores of the Mediterranean, and twelve from Toulon, is the least exceptionable part of Provence for the residence of a consumptive invalid; but it is so confined and limited, as to afford little choice of situation.

Nice, in the general character of its climate, resembles Provence. Its mean annual temperature is 59° , being 9° warmer than London, and the temperature is more equally divided throughout the year than in any other place in the south of Europe, except Rome and Cadiz. The maritime Alps rise behind it and shelter it from the north, while, during the summer, the heat is tempered by the sea breeze, which blows almost as regularly as in a tropical climate: it is, however, exposed to the east winds, which prevail during the spring. Nice is, upon the whole, a healthy place; but among the diseases which occur catarrh and inflammation of the lungs are the most frequent; and phthisis, though less frequent than in England, is

by no means uncommon, forming, in the list of deaths, about one in seven.

“In consumption, the disease with which the climate of Nice has been chiefly associated in the minds of medical men in this country, little benefit I fear is to be expected. When this disease is complicated with an inflammatory, or highly irritable state of the mucous membranes of the larynx, trachea, or bronchia, or of the stomach, Nice is decidedly an unfavourable climate; and without extreme care on the part of such patients, and a very strict regimen, the complaint will in all probability be aggravated by a residence here. Indeed, the cases of consumption which ought to be sent to Nice are of rare occurrence. If there are any such, it is when the disease exists in torpid habits, of little susceptibility, or not much disposed to irritation; and when it is free from the complications which have been just mentioned. Even the propriety of selecting Nice as a residence for persons merely threatened with consumption, will depend much upon the constitution of the individual. Dr. Skirving has met with cases which leave no doubt on his mind that a residence for one or two winters often proves of advantage, as a preventive measure, in young persons threatened with this disease; and even in some cases when there was every reason to believe that tubercles already existed in the lungs, the climate has appeared to be useful. But in the advanced stage of consumption, his opinion, founded on eight years’ experience, accords with what has been already stated; and this is still further supported by the testimony of Professor Foderé, of Strasbourg, who resided six years at Nice*. Indeed, sending consumptive patients in this stage to Nice, will, in a great majority of cases, prove more injurious than beneficial.

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“In stating its general influence on the animal economy, I would say, that the climate of Nice is warm, exhilarating, and exciting, but, upon the whole, irritating—at least to highly sensitive constitutions. It is extremely favourable to the productions of the vegetable kingdom, some of which flourish here in a degree of luxuriance that is scarcely

* See Voyage aux Alpes Maritimes, ou Histoire naturelle, agraire, civile, et médicale, du pays de Nice, &c. Strasbourg, 1823.

to be equalled in the other parts of the south of Europe. * * * *

“Invalids should endeavour to arrive at Nice about the middle of October, or sooner, and should not leave it before the beginning of May. Whatever inconvenience they may here suffer from the spring winds, they will experience in a greater degree by returning through the south of France; and, accordingly, both Dr. Skirving and myself have known invalids suffer materially from the winds of Provence by leaving Nice too early. It is true that the new road which has lately been opened between Nice and Genoa, admits of the invalid moving in that direction at a much earlier period than it would be advisable for him to return over the Estrelles to Provence; and when the climate of Nice is found to disagree, a change in the spring in the direction of Genoa may, in some cases, be advisable.”

Villa Franca has no advantage over Nice, while it is more exposed to the east winds, which constitute the most objectionable part of the climate of both.

CLIMATE OF VARIOUS PARTS OF ITALY.

The climate of Italy is extremely diversified; but in the work before us the observations relate exclusively to the tract of country between the shores of the Mediterranean and the southern base of the Apennines. The atmosphere of this district is warmer and drier than the south-west of France, but the range of temperature is greater; it is not so harsh and irritating as that of Provence. The internal differences between the various situations in this district depend upon their relative position as regards the sea and the mountains.

Genoa is hemmed in between the sea and a range of steep hills; so that there is little country for excursions. The summer is warmer, and the winter colder than at Nice; the distribution of heat throughout the year, and even from day to day, is unequal. The climate on the whole is not unpleasant; and is not unsuited to dyspeptic and gouty habits, but is ill adapted for very sensitive invalids—such as consumptive persons usually are.

Florence, delightful as a residence for the healthy, is extremely unfit for any one with delicate lungs. The winter is only 4° warmer than that of Lon-

don, which makes it nearly the same as that of Penzance. The difference between the mean temperature of the warmest and coldest months is 36°; but the climate, nevertheless, is less variable from day to day than that of Naples. Dr. Clark does not know “any class of invalids for whom Florence offers an advisable residence,” but to persons not likely to suffer from the vicissitudes of temperature which have been noticed, and who can support the great heat of summer, it holds out many inducements as a residence during the whole year.

Pisa is resorted to by invalids from the rest of Tuscany, and by many from all parts of Europe. It stands on the banks of the Arno, about five miles from the sea; the river, in flowing through it, makes a semicircular sweep, and the buildings along the north bank present the form of a crescent, looking to the south. This part of the town is the principal resort of invalids.

“Pisa is not so warm as Rome in winter, and is hotter in summer. In winter it is 7° warmer than London, and 2° warmer than Penzance. In spring it is 8° warmer than London, and about 7° warmer than Penzance. The range of temperature between day and night is very considerable. According to Professor Piazzini, the fall of rain annually is very great, being 45.66 inches, which is nearly as much as falls in Cornwall. The climate of Pisa is genial, but rather heavy and damp. It is softer than that of Nice, but not so warm; less soft, but less heavy and depressing than that of Rome. For invalids who are almost confined to the house, or whose power of taking exercise is much limited, Pisa offers advantages over either Rome or Nice. The Lung’ Arno affords a warm site for their residence, as well as a sheltered terrace for their walks. But they must be careful to confine themselves to it. They should not venture into the cross streets before April.

The most common acute diseases are peripneumony, (*mal di petto*), dysentery, and gastric fevers. Cataract and ophthalmia are common; but this is the case over the whole southern parts of Italy. Phthisis pulmonalis is not a common disease, but chronic bronchial affections are frequent; and croup is occasionally met with. At one period, intermitting fevers were very prevalent about Pisa; but since the surrounding country has been drained and cultivated,

they are comparatively rare. In the hospital, however, the double tertian is endemic; and a large proportion of the patients who undergo operations, have an attack of this fever, which sometimes even assumes the pernicious form. Hospital gangrene is certainly more common in the hospital at Pisa than in most other hospitals in Italy. Nervous diseases likewise prevail, but not so much as at Rome. Affections of the bones appear to be more common here than usual, particularly that called spina ventosa. Calculous diseases are so rare, that Vacca, during thirty-two years that he had been operating on such patients from all parts of Italy, has not had occasion to operate on one Pisan."

Naples resembles *Nice* as to climate, but the atmosphere is much more changeable. The mean annual temperature is higher than that of *Rome*, *Pisa*, or *Nice*, but the range of mean temperature amounts to 30° .

"Of *Naples* as a residence for invalids it is unnecessary to say much. Consumptive patients should certainly not be sent there. The circumstances which have been pointed out in its climate, sufficiently mark it as a very unsuitable residence for this class of persons; and to the list of its defects must be added that of its topographical position, which affords no proper places for exercise, without such exposure as would prove highly injurious to delicate invalids. For chronic rheumatism it is, as compared with *Nice* and *Rome*, certainly inferior. *Naples* is however well suited as a winter residence for those who are labouring under general debility and derangement of the constitution without any marked local disease. The beauty of its situation, the brilliancy of its skies, and the interest excited by the surrounding scenery, render it a very desirable and very delightful winter residence for those who rather require mental amusement and recreation for the restoration of their general health, than medical treatment for any particular disease.

"With respect to choice of situation in *Naples*, invalids with whom a warm and rather close atmosphere agrees, will find themselves best in the *Chiaja*, *Vittoria*, or *Chiatamone*. With patients labouring under nervous dyspepsia, and nervous invalids generally, these places will not agree. The *Largo del Castello*, *Pizzo Falcone*, *San Lucia*, and *Largo*

del Vasto, afford more favourable residences for them."

Rome.—The mean annual temperature is 10° above that of *London*, and 4° below that of *Madeira*. In range of temperature it has the advantage of *Naples*, *Pisa*, and *Provence*, but not of *Nice*. It is a soft, but not a damp climate, being considerably drier than *Pisa*, and much more so than the south of *France*. It is however not so dry as *Madeira*. The atmosphere of *Rome* is remarkable for its stillness, high winds being rare. This, taken with its other qualities, renders its climate "altogether the best of any in Italy." When wind does occur at *Rome* during the winter or spring, it is chiefly from the north, and is of short duration, seldom exceeding three days.

Dr. Clark next proceeds to speak of the disease of *Rome*, and enters fully into the subject of malaria; but as our space will not admit of our doing justice to him or to our readers, we shall postpone our account of the remaining parts of the volume till another number.

[To be continued.]

EXTRACTS FROM JOURNALS, *Foreign and Domestic.*

CEREBRAL CONGESTION, WITH INVOLUNTARY RETROGRADE MOVEMENT.

M. LE CHEVALIER D —, aged 56, of sanguine temperament, and good constitution, had suffered two months previously from an inflammation of the chest; was attacked, November 9th, with pharyngitis, which was treated by means of twenty leeches to the throat, emollient poultices, &c. &c. He had in the evening flushing of the face, slight injection, and brilliancy of the eyes; strong, but not frequent pulse; hot skin, and sense of uneasiness in the occipital region, and difficulty in moving the neck laterally. During the night vertigo, stunning, and obscure pain of the head. He had had nocturnal emissions for five or six nights. He got upon his knees in bed for the purpose of making water, which brought on a tendency to fall backwards, which he avoided by holding to the bolster. He had constant erections, without emission, which symptom had come on when he went to bed at nine in the evening, and lasted till seven next

morning, when he got up. At this time he no longer presented the appearance of congestion about the face or eyes; but the skin in the occipito-cervical region was very much injected with tumefaction, but without tenderness on pressure. Pulse strong, but not frequent. M. D. in spite of the representations of his medical attendant, who wished him to keep his room and submit to antiphlogistic treatment, walked a short distance, in doing which he was obliged to stop, in order to avoid falling backwards, and to resist the propensity he had to walk in the same direction; nay, he was unable to resist making a step back when he wished to have gone forwards. Arrived at the place of his destination, he experienced a repetition of the same symptoms, and made nine or ten steps in a retrograde direction, and would have fallen on his back if he had not been prevented by a piece of furniture in the room where he was. When he returned home the same inclination continued. He was now got into bed; bled to the extent of eighteen ounces, and put on rigorous diet; two hours after which the symptoms disappeared, except that the cervico-occipital region, however, retained its tumefaction. He had a mustard foot-bath in the evening, and rested well after it. Next day all that remained of his complaint was some swelling about the back of the neck, and a difficulty in moving his head sideways. These, likewise, disappeared in three days.—*Journal de Physiologie*.

ILLUSTRATIONS OF THE PECULIAR OPERATION OF MEDICINES ON DIFFERENT CLASSES OF ANIMALS.

Medicines have very dissimilar effects on different animals. For the expulsion of worms, or to assist the action of purgatives, two drachms of calomel are often given to the horse; two grains would puke the strongest dog. The reason why persons are enabled to give the excessive and preposterous doses of fifteen or twenty grains is, that the stomach very soon rejects the whole or the greater part; or if a few grains be retained amidst the rugæ of the stomach, they produce inflammation of the bowels, discharge of blood, and tenesmus. Four ounces of spirit of turpentine may be given to the horse, not only with impunity, but with advantage, in spasmodic colic. One drachm cannot be administered to the dog but with almost certain destruction. From four

to eight drachms of aloes are required to purge a horse. The smallest dog requires nearly a drachm; while six or eight grains will purge the largest hog. Castor oil is with dogs as bland and safe a purgative as in the human subject; with opium and some aromatic, it is a specific for spasmodic colic in the dog. In the horse, it is uncertain, irritating, and unsafe. Two grains of the antimonium tartarizatum will vomit the largest, and destroy a small and delicate dog. From two to four drachms are, according to the opinions of some surgeons, given to the horse, as a vermifuge or as a nauseant, or a diaphoretic; and a greater quantity has been administered without unpleasant consequences. A drachm of the superacetate of lead would destroy a dog; an ounce has destroyed the horse. A pig will drink almost enough to float him with impunity.—*Provincial Med. Gaz.*

ANATOMY OF THE SKIN.

Dr. Weber, of Leipzig, asserts that the sebaceous follicles of the skin are organs distinct from the bulbs of the hair, and that they exist over the whole surface, excepting the palms of the hands and soles of the feet. The bulbs of the large hair are situated very deeply in the derm, and sometimes penetrate even into the subcutaneous adipose tissue: the sebaceous follicles, on the contrary, are nearer to the cutaneous surface, and are never found extending to the adipose structure. Their size, also, says he, is too large to permit them to be confounded with the bulbs of hair, which are much smaller. In new-born children, sebaceous follicles may be discovered on all parts of the skin, with the two exceptions already named. The skin of the scrotum shews them very much developed: each of these follicles is composed of four or five compartments, or cells, agglomerated together; their transverse diameter exceeds their depth. The greatest diameter observed by the author was a quarter of a line.—*North American Med. and Surg. Jour.*

EXCESSIVE THIRST CURED BY CAMPHOR.

Dr. Allert has related an instance of excessive thirst which took place in a female. Notwithstanding an immense quantity of cold water drank by the patient, the thirst was not in the least abated. Her tongue was red, and her ankles began to exhibit appearances of

oedema. The cause of this affection could not be determined. After the ineffectual employment of many remedies, the patient was finally, speedily, and entirely cured by the exhibition of large doses of camphor.—*Journal der Practischen Heilkunde.*

LIGATURE ON THE DISTAL SIDE OF ANEURISMS.

[The following remarks are contained in an interesting and impartial article on this subject in the last Number of the Glasgow Medical Journal.]

We must be permitted, however, to remark, that the successful cases fail to establish completely the efficacy of the new operation, because it yet remains to determine by dissection what had been the real nature of the diseases, and what was done by the operators. Unfortunately, too, in the cases which were fatal, the results of the dissections were far from satisfactory. The aneurisms amounted only to dilatations of the artery, and these of no very great extent. Comparing the size of the aneurism after death, in Mr. Lambert's case, with what is said of it in the first report, there is not much diminution to place to the credit of the operation: and in Mr. Wardrop's own second case, all admit that there was found no trace of ligature on the carotid, and some have broadly declared that the vessel bore quite as little appearance of aneurism of any description. All these unpleasant circumstances considered, it might have been well to defer the publication of the cases in a collected form, till some more unexceptionable evidence of success could be afforded. If the artery escaped the ligature in one case, we cannot complain if some are disposed to doubt whether it were secured in the others, till it has been actually seen obliterated; and the small appearances of aneurism, which the two dissections showed, may naturally strengthen the doubts of those who openly questioned whether the first case was an aneurism at all. Mr. Wardrop says it was an aneurism; and we ourselves have all along admitted his assertion. But the fact rests on his authority only, for the symptoms are too briefly detailed to enable one to form a decided opinion. So far as yet appears, the most convincing cases are those of the American and the Derbyshire surgeons. The symptoms narrated are the most decisive, and the event the most satisfactory.

Mr. Wardrop seems to have submitted his patients to a regimen almost as severe as that of Valsalva. For a month after he had tied the subclavian for the aneurism of the innominate, his patient was allowed only an ounce of meat, and twelve ounces of fluid, in the day, while she was very frequently and largely bled. Many of this woman's symptoms seem to be referable less to the tumor which appeared externally, than to disease of the heart and of the great vessels deep in the chest. May not much of the relief, which she seemed to derive from the operation, have arisen from the well-known efficacy of abstinence and depletion? * * *

In the work of Mr. Hodgson, there is a chapter on this operation of Brasdor. He discusses the principles on which it must act; he shows that the blood should coagulate, under favourable circumstances, exactly as after the common operation; he points out the occurrence of spontaneous cures when the aneurism takes such a direction as to compress the artery beyond it; and he leaves his readers, with the conviction that the operation is likely to succeed in all cases where the ligature can be applied between the sac and the next collateral branch. Beyond such a branch, he thinks the ligature must fail; because circulation would still go on through the sac too freely to permit coagulation. According to this view, there are only a few arteries which are favourable to this operation: those which, like the carotid, are for a great extent free from branches; and it is not to be preferred to the other, but only resorted to when that other is rendered impracticable by the situation of the aneurism. Mr. Wardrop goes so far as to propose to tie the subclavian and carotid, successively, in aneurisms of the innominate, though the ligature of either of these would, according to his own calculation, lessen only by one-half the passing current of blood, and though he admits that the subclavian cannot be tied so near its root, as the origins of its first four branches. Nay, he sees in Brasdor's operation, certain advantages which may make it worthy of preference where choice is in our power. We fear it will be found that his expectations, on this point, are greatly too sanguine. * * *

Mr. Wardrop also argues that there is less risk of secondary hæmorrhage in his than in the old operation: that the

ligature "has not to stem a strong current of blood, until the internal coagulum is formed, and the sides of the artery adhere," that it resists it only "for a few minutes; for, the blood receiving a new direction, the circulation in the tumor becomes extremely languid, and the blood contained in the canal of the vessel, between the ligature and the tumor, must cease to circulate, be immediately coagulated, form a complete barrier to any future circulation, and thus render any assistance from the ligature quite unnecessary." We cannot perceive the difference in the action of the ligature in the two cases. In each, it is the first agent in stopping the circulation through the vessel on which it is applied, and the sole obstacle to that circulation, till a coagulum is formed. The blood stagnates in the healthy artery back to the nearest branch, and coagulates, just as it does in the aneurism, and "in the canal of the vessel between the ligature and the tumor." What reason is there why it should do so more slowly? In each case the obstruction of the direct circulation drives the blood into the collateral channels, and the "new direction" should be received quite as early and as completely in the one as in the other.

Mr. Wardrop attempts a mechanical explanation of the diminution of the swelling which he regards as the *constant* result of his operation. We have said that his own facts do not prove that it is constant. They are too few to do so, even did they all concur. The explanation seems a decided failure. Mechanical principles lead us to believe that the additional impulse on the walls of the sac will be slight, and therefore unfit to cause any but a very small dilatation; but it is difficult to shew how, by throwing an additional obstacle in the way of the circulation beyond the tumor, that tumor can be actually diminished.

DIAGNOSIS OF DISLOCATION FROM FRACTURE OF THE NECK OF THE HUMERUS.

The first part of the sixth volume of the *Repertoire* contains Dupuytren's directions for distinguishing dislocations of the humerus from fractures of its neck. The position of the arm at the time of the fall is one means of discrimination. If it were thrown outwards or forwards to break the fall, so that

the hand first struck the ground, dislocation is the more probable accident. If the person have fallen on the shoulder, while the arm was close by the side, fracture is more likely. Even when the patient cannot tell in what manner he fell, much may be gathered from the marks of contusion and abrasion on the hand in the former case, and on the shoulder in the latter. In luxation, if ecchymosis occurs, it is on the inner and fore part of the arm, because it arises from the laceration of the parts on the inner side of the joint. In fracture, in which it is more common, it is on the top of the shoulder itself, because it is produced by the direct contusion. In dislocation, the prominence of the acromion, and the flattening of the deltoid, are greater than they are in fracture. In the latter, the muscle seems shortened and swollen. In luxation, there is a hollow on the inner side of the deltoid, from the removal of the head of the bone. This is less conspicuous in fracture. These, with the differences in the shape of the bony tumor in the axilla, in the degree of mobility, in the facility of reduction, and with the presence of crepitus in the one, and its absence in the other, sufficiently distinguish the two accidents.—*Ibid.*

HOSPITAL REPORTS.

EDINBURGH INFIRMARY.

Cases of Abscesses which communicated with the Knee-joint.

CASE I.—George Mitchell, æt. 16, admitted under the care of Mr. Liston, on April 5th.

The knee and lower part of the thigh were involved in a considerable swelling, in which fluctuation was perceptible. The disease was attributed to his having walked a considerable distance, about six weeks previous to his admission. An incision was made anterior to the inner ham-string, and about 1½j. of purulent matter, mixed with blood, was discharged. By the introduction of the finger into the wound, a portion of the posterior surface of the femur was found denuded to a considerable extent. By the use of a bandage the swelling diminished, the discharge decreased, and the patient's health improved. About four weeks after admission he was seized with diarrhœa; the discharge and swelling increased, his health declined, and severe hectic symptoms having occurred, the limb was removed.

Transfixion was performed horizontally, and an anterior flap formed from the fore-

part of the thigh; a similar flap was made posteriorly.

Mr. Liston stated, that he prefers this method of amputating in the middle and in the upper part of the thigh, for the following reason. The resistance to the flexor muscles of the thigh being diminished by the removal of the limb, the psoas and iliacus bring the thigh (especially in young subjects) into the state of flexion; and the flaps naturally inclining downwards, the femur projects anteriorly. In the lateral operation, the extremity of the bone is in contact with the wound, and, from the cause above mentioned, occasionally protrudes; whereas, by the formation of anterior and posterior flaps, it is removed farther from the wound, and is more completely covered.

This mode of operation he considers inadmissible in the lower part of the thigh, from a want of sufficient muscular substance for the formation of the flaps, and from the contiguity of the knee-joint.

The abscess freely communicated with the cavity of the knee-joint.

The lower part of the femur was found much softened in texture, and denuded of its periosteum; and a considerable portion of the external lamina of the bone seemed to have been in progress towards separation. Several osseous nodules were deposited under the adjacent periosteum, which was thickened and highly vascular.

The cure proceeded favourably, and the wound was almost entirely cicatrized on the twelfth day after the operation.

CASE II.—Jane Marshall, æt. 17, admitted under the care of Mr. Liston, May 2d.

Three years ago she sustained an injury of the knee-joint, in consequence of the limb having been entangled in the spokes of a carriage-wheel; ever since the accident the knee has been painful and much swollen, and she has had a halt in walking. About a fortnight ago, having been attacked with rigors, the pain and swelling of the knee increased; and, ten days previous to admission, an abscess in the ham gave way, and a considerable quantity of pus was discharged.

The whole limb is œdematous, and fluctuation is perceptible in the fore part of the swelling of the knee. An incision was made, and much pus evacuated. Tongue foul; pulse 120; no appetite; much thirst; nights restless.

May 5th.—She feels much easier, and the limb is supported by a bandage. Ordered wine and nourishing food.

8th.—Some vomiting this morning. Profuse perspiration. Pulse quick, and feeble. The swelling of the thigh is considerably diminished, but the discharge from the wound is more copious.

10th.—Yesterday the limb was removed. Anterior and posterior flaps were formed.

The abscess communicated with the cavity of the knee-joint, the cartilages of which were much ulcerated, and the synovial membrane slightly thickened. The epiphysis of the lower end of the femur seemed to have been separated and displaced from the lower end of the bone, as the displaced condyles were connected to the posterior part of its shaft.

12th.—The stump was dressed to-day, and looks well.

Habeat Vini Rubri \mathfrak{z} iv. and light nourishing diet.

For some days after the operation, the profuse perspiration continued, attended with hurried breathing, rapid pulse, and prostration of strength. Stimulants were administered with evident benefit. The œdema of the thigh gradually diminished. The discharge from the stump was unusually copious, and the cicatrization proceeded slowly.

She was dismissed cured on the 19th June.

CASE III.—Robert Blacklaw, æt. 11, admitted under the care of Mr. Liston on the 12th May.

About ten days previously, swelling, attended with pain, occurred in the left ham, and extended to the knee and lower part of the thigh. When admitted, the parts were much swollen, red, and tense. Pulse 140.

A considerable quantity of pus was evacuated from an incision made on the anterior and lower part of the thigh. On introducing the finger into the wound, the abscess was found to communicate with the cavity of the knee-joint, from which also purulent matter escaped. He was ordered wine and nourishing food.

16th.—Slight diarrhœa; profuse discharge from wound; pulse 120.

17th.—To-day the limb was removed at the upper part of the thigh. Anterior and posterior flaps were formed.

18th.—Pulse 90; skin cool; was ordered \mathfrak{z} v. of wine, and an anodyne draught.

21st.—Several of the sutures were removed, and straps of adhesive plaister applied. Pulse 125.

23d.—He had several attacks of rigors. Pulse 140, and weak.

The inner side of the thigh became considerably swollen, with an obscure sense of fluctuation: on an incision being made, a small quantity of pus escaped.

26th.—The rigors have continued; and he has complained for several days of difficult breathing, and severe pain in the chest, over which two blisters were applied.

On the evening of the 27th, he died.

In the left cavity of the pleura, there was about lb. j. of sero-purulent fluid; and portions of the pleura pulmonalis were coated by coagulable lymph, which, in some points,

formed adhesions to the pleura costalis. An abscess of considerable size extended from the inner side of the stump to the upper part of the thigh. The femoral vein was much inflamed, and contained purulent matter.

The patient was apparently of weak intellect, and complained of no pain during the operation, or afterwards.

GLASGOW ROYAL INFIRMARY.

Cases of Intermittent Fever treated with large Doses of Sulphate of Quina, under the Care of Dr. Millar.

CASE I.—Hugh M'Lean, æt. 53, a sailor of a sallow bilious aspect, was admitted May 19th. Every second day, about five o'clock, p.m. has a rigor, followed by flushes and perspiration. The paroxysm continues three hours, each stage occupying about an hour. During the intermission, has headache, nausea, and languor. Along with the above symptoms has a rheumatic affection of the shoulders. Sleeps ill; appetite bad; tongue white; bowels habitually costive; stools dark, sometimes clay-coloured; pulse 100, weak; skin moist. Complaint is of five weeks' duration, and he ascribes it to cold. Has hitherto had no medical treatment. Seventeen years ago, while in Kent, had ague; which has never recurred till now.

To take immediately gr. viii. of Calomel, and after four hours a dose of Salts and Senna.

May 20th.—Two stools.

R Aquæ Menth. Pip., Aquæ Puræ, aa. ℥ss. Symp. ℥ij. Tr. Opii, mxxv. to be taken half an hour before the fit is expected.

R Aquæ Puræ, lbj. Syrup. Zingib. ℥iss. Solut. Arsenicalis, ℥j. To take ℥j. every fifth hour after the paroxysm has gone off.

21st.—Had a fit last night, but, as far as can be understood, no cold stage; and the hot and sweating stages were shorter. Rheumatic pains troublesome.

22d.—An attack again last night, at the usual hour.

23d.—Had again a fit yesterday evening, but the cold and the hot stage were so slight as to be entered on the journal almost as wanting. Should the paroxysm return next day he is ordered to have gr. x. of the sulphate of quinine.

The paroxysm did return, and the quinine was administered. He remained in the Infirmary till the 20th of June, during which time the rheumatic affection was removed by the application of moxas, and he had no more attacks of fever.

CASE II.—James Forbes, æt. 22, a drover, admitted May 21st. Every second day, but each time two hours earlier than on the preceding, has a rigor, followed by heat of body, but no perspiration. The paroxysm continues four hours, each stage occupying two. During the intermission, is quite free from pyrexia. Tongue white; bowels costive; pulse and skin natural. Was first affected twelve days ago. Never had a similar complaint before. Knows of no cause. Was in Lincolnshire ten weeks ago, when ague was prevalent there. Has had no treatment.

Sumat statim Bol. Commun.

22d.—Bowels opened by the bolus. Expects a fit to-morrow, at 8 A.M.

Cras. mane, horâ septimâ. Sum. Sulph. Quinin. gr. x.

Never had another attack, and was dismissed in perfect health on the 29th.

CASE III.—Peter Donally, æt. 17, sawyer, presented himself in the lobby for advice on the 5th of June. He stated that every second day, about noon, he had a shivering fit, followed by general heat of body and perspiration; that the paroxysm generally continued two hours—the cold stage three-quarters, the hot one-quarter, and the sweating one hour; that he had been in Lincolnshire three months ago, a month after which was attacked by the complaint; was received into the Dumfries Infirmary, and sent out cured in five weeks; but after being a week out the complaint recurred.

He was recommended to take 10 grains of quinine immediately after the next fit, which he expected on the 8th. By mistake, however, he took the medicine at twelve o'clock on the 7th; this was followed by an immediate accession of the attack, but it was not so severe as formerly. He was admitted into the hospital on that day, and remained until two periods had passed without any paroxysm, when, at his own request, he was permitted to go home.

CASE IV.—Sarah Thomson, æt. 26, June 1st. Has an attack of fever daily, between two and three o'clock p.m. The first two stages continue an hour and a half, and the sweating stage does not go off till the following morning. When the fit commences has nausea, vomiting, and pain of stomach; during intermission is quite well, except a feeling of oppression at præcordia. Complaint is of nine weeks' duration; never had ague before. Was in New York about four months ago.

Hodie postimpet. finit. hab. Sulph. Quin. gr. x. Cras mane bol. comm.

June 2d.—Paroxysm recurred last night,

after which she had the medicine ordered. No effect from bolus.

Hab. stat. enema comm.

3d.—No fit last night. This morning some nausea; removed by an emetic. The fit never returned, and she was dismissed on the 11th.

Injuries of the Head.

Case of Concussion.—Robert M'Kay, æt. 26, plasterer, admitted April 16th. This evening, while plastering the ceiling of a lofty room, the scaffolding upon which he was standing gave way, and he fell to the floor, a height of 20 feet, pitching upon his head. When brought to the hospital, about an hour after the accident, he was found lying in a state of coma, from which he could not be roused, and his breathing was occasionally stertorous. There was some diffused swelling over the posterior part of right parietal bone, and when this point was pressed he seemed to experience pain. Pupils contracted freely on exposure to light; he had occasional strong convulsive motions of his extremities, particularly of his arms; skin was rather cold, and he shivered occasionally; pulse 80, small, but regular; three hours after admission pulse became strong and full, and rose to 96. He was bled to 24 oz. after which pulse fell considerably, and a turpentine enema was administered.

17th.—Bandage came off the arm this morning, and before it was discovered he lost 12 oz. of blood; breathing less stertorous; heat natural, and pulse 80; otherwise as yesterday. One stool from enema.

Lot. ex aq. Calc. et Spir. Dil. capiti.

18th.—Yesterday evening pulse fell to 60, and he was again bled to $\frac{3}{4}$ xviiij. Still comatose, but no stertorous breathing. Urine passed in bed since admission.

Rep. V.S. Cont. Lot. evapor.

19th.—Bled to $\frac{3}{4}$ viiij. Pulse 96. Otherwise as yesterday.

Sum. Sulph. Magnes. $\frac{3}{4}$ i. Cont. lot. evap.

20th.—Twelve leeches applied to temples this morning. Breathing slow and laborious. Pupils dilated, and do not contract. Teeth and lips encrusted. Pulse 70. Stools and urine passed in bed.

Rep. V.S. ad. $\frac{3}{4}$ x. Capit. Appl. Vesecator.

After the blister rose there was a decided improvement. The patient became more sensible; he could readily be roused; he seemed to understand questions, and he attempted to reply. The improvement, however, was of short duration. On the 23d he became less sensible, and more restless. Pulse 92, of good strength. Twelve leeches were applied to the temples; and the blis-

tered surface having healed, another blister was applied to the vertex. On the 24th he continued restless, and his pulse had risen to 120. His countenance had a sunken look, and he had relapsed into his former state of insensibility. On the 25th he died.

Inspection.—On removing the scalp, some lividity was observed on its posterior part, and on the corresponding surface of the bone. On the posterior surface of both hemispheres of the brain, and beneath the dura mater, was a layer of effused blood, about a line in thickness. A thin coagulum also extended some way over the surface of the cerebellum. The brain was firm, and not unusually vascular. There was some effusion at the base of the brain, and into the ventricles. Abdominal and thoracic viscera healthy.

Case of Compound Fracture of the Skull, and Elevation of the Depressed Portions, followed by Hernia Cerebri.

Jas. Diamond, æt. 48, labourer, admitted April 18th. This forenoon was struck upon the left side of head, and knocked down by a stone thrown from the roof of a house. In his fall he received a wound of forehead; was insensible for a short period after the injury, but he soon recovered himself. He was brought to the hospital about an hour after the receipt of the injury. There was a lacerated wound over upper and posterior part of left parietal bone, nearly of a triangular shape, and the extreme length of which was about two inches and a half. The bone was exposed; fractured in several pieces; and depressed nearly to the extent of the original wound. There was also a wound of forehead, seated over right eye-brow, about two inches in length, exposing the bone; which, however, was not denuded. He complained of a feeling of numbness, with a loss of muscular power in right arm. He was lively, and perfectly sensible; had no head-ache, and his pulse was 80, regular. It was judged necessary to remove the depressed portions of bone. This was accordingly done by enlarging the original wound, raising the depressed fragments with the elevator, and removing them with the forceps. The dura mater was found to have been wounded by one of the spiculæ, and the wound bled freely. The edges of the wound of scalp were brought together by a single strap, and over this was placed a piece of dry lint. In the evening, when the bleeding had ceased, the wound was completely dressed, and a compress lightly applied over it.

Vesp. Hab. Sulph. Magnes. $\frac{3}{4}$ iss.

19th.—Head-ache last night, with increased paralysis of arm. Was bled to $\frac{3}{4}$ xvij. which removed the head-ache. Paralysis of arm still increases. Complains to-day only of pain in the wound. Is perfectly sensible,

and countenance and respiration natural. Pulse 100, full, and of good strength. Tongue brown and dry in the centre. No stool.

Hab. Sulph. Magnes. \mathfrak{z} j. st. et rep.
V. S. si. op. sit.

20th.—Intense pain in the head last night, for which 24 oz. of blood were taken. Slight delirium after the bleeding, and a restless night. At present is quite collected; says he is free from pain. Pupils natural. Pulse 100; compressible. Tongue moist. Bowels freely opened.

Temps. admov. Hirud. xx. Cr. M. Rep.
Sulph. Magn. \mathfrak{z} j.

21st.—Loss of speech after the bleeding on the 19th, and again after the application of the leeches yesterday. To-day appears sensible, and understands questions put to him; but the only words he can articulate are "aye" and "no." Paralysis of right arm increased, and there is also drooping of the right eyelid. Pupils natural; slight delirium during the night; pulse 100, easily compressible; tongue dry in the centre, moist at edges; no stool, though a calomel and jalap bolus given in addition to salts. Wound dressed; its edges rather sloughy.

R Opii gr. ij. Pulv. Antimon. Calomel.
aa. gr. v. M. ft. pulv. vesp. sumend.

22d.—Violent delirium for a few minutes after the visit yesterday: in other respects no change; pulse 92; one stool.

R Calomel. Pulv. Antimon. aa. gr. ij.
Pulv. Opii. gr. ss. M. ft. pil. ter. ind.
sumend.

23d.—A restless night. Paralysis of right leg, observed yesterday evening, has to-day increased. Is aware of questions, but makes no answers. Stupor since morning; pupils contracted; pulse 90; wound dressed; it is sloughy throughout, and there is an incipient fungus at its anterior angle; pressure made over the fungus by means of dry lint and straps.

Omitt. Med.—Temps. Admov. Hirud. xij.

24th.—Towards evening of yesterday stupor gradually increased: he sunk, and died this morning.

Inspection.—The wound had a sloughy appearance, and its centre was occupied by a brownish-coloured fungous substance, which protruded slightly beyond the edges of the wound. For some distance around the opening in the bone, the pericranium was destroyed, and the bone rough, and of a deeper colour than natural. The inner surface of the dura mater and the left hemisphere of the brain were coated with purulent matter. Corresponding to the opening in the bone was another in the dura mater, through which the fungus protruded. Around this

the dura mater was much thickened, and of a dark brown colour. The fungus arose from the superior and posterior part of the middle lobe: it was nearly of the size of a pigeon's egg, and of a dark brown colour, which gradually turned into grey, as it passed into the surrounding cerebral substance. The central part of it was soft, yielding readily to slight pressure; but it became firmer as the distance from its centre increased. Immediately around it, the brain presented numerous bloody points. Otherwise the substance of the brain was firm. A quantity of turbid effusion was found in the ventricles and at its base. Abdominal and thoracic viscera healthy.

MEATH HOSPITAL, DUBLIN.

Ligature of the Carotid Artery.

AUGUST 22, 1829.—The common carotid artery was tied to-day at this hospital by Mr. Porter, under the following circumstances:—

The patient, a woman aged about 40, and in every other respect apparently healthy, was admitted on the 19th inst. with a pulsating tumor, occupying almost the entire of the right side of the neck. It extended from the root of the ear downwards to within an inch of the clavicle; in front it leaned against the trachea, and posteriorly it had pushed the sterno-mastoid muscle considerably out of its place. Its length might have been about five inches and a half; its breadth, about four. It had continued for some years small, and making but slow progress; but about three weeks ago she received an injury, and then it increased with great rapidity, became painful, and deprived her of sleep. Its growth was so rapid as to render it absolutely necessary to perform the operation with as little delay as possible.

She was placed lying on a table, her head supported by pillows, and the light falling on the right side of the neck; an incision was then made from the lower edge of the tumor to the sterno-clavicular articulation; another, about three inches long, at right angles with the former, along the clavicle, and the flap dissected up. The mastoid muscle was thus exposed, under which a director was passed, and the sternal and two-thirds of its clavicular attachments were divided. A strong fascia then came into view, which was pinched up in a forceps and divided, after which the knife was almost entirely laid aside. The edges of the sterno-thyroid and sterno-hyoid muscles were pushed by the fingers of the operator towards the trachea, and the sheath of the vessels exposed; this was torn by a director, and the artery thus completely laid bare. Mr. Porter on this occasion used the same needle which he had before employed for the ligature of the subclavian, the point

of which containing the ligature screws off, and is drawn up at the other side by means of a hook with the greatest facility. The needle was passed from without inwards, and whilst the artery lay upon it, the vessel was compressed with the finger, in order to see what effect it might have on the tumor: the pulsation immediately ceased, and the ligature was then tied firmly and closely. The size of the tumor evidently became diminished even before the patient was carried from the table. The wound was closed with two stitches, and the entire operation concluded in 17 minutes. She lost not more than three or four ounces of blood.

After the operation she had a composing draught, the wound being dressed with pledgets of lint, dipped in spirits and water; and in an hour afterwards, when the reporter left her, she was perfectly tranquil and composed. The future progress of the case shall be taken notice of.

Ligature of the Subclavian Artery.

Perhaps it may be well to mention that the patient whose subclavian artery had been tied (see Gaz. No. 84), left the hospital July 29th, 30 days after the operation; however, from making too free in his diet, the sac of the aneurism inflamed and suppurated. On the 14th of August the abscess was opened, and nearly a pint of purulent matter, mixed with clots of blood, evacuated. Pressure was applied over the sac, and the patient never had an untoward symptom. At this moment the wound is discharging a very small quantity of a serous fluid, and the patient (from the absence of any unpleasant affection) may be considered as completely recovered.

GLOUCESTER INFIRMARY.

Singular Tumor, growing from the Dura Mater, at the Base of the Cranium.

WILLIAM BEVAN, æt. 21, four months previous to his admission into the Infirmary, caught a violent cold, by working in a damp room under ground, which continued about a month, and then left him; but a few days afterwards he experienced a dull aching pain in his right ear and temple, which gradually extended over his cheek, always continuing, but sometimes much worse than at others. He was then bled, and had leeches applied to his temple, by which the pain was a little alleviated. The pain then extended along his lower jaw; his right eyelids were at the same time drawn a little outwards, which was accompanied by a sensation of stiffness.

In proportion as the pain descended and spread over his face, the feeling of the affected parts diminished. He lost his hearing on that side entirely; the corner of his mouth was drawn towards his cheek, and his speech became very thick and indistinct. The inside of his mouth was a little swollen,

near the angle of the jaw; his taste on the right side was destroyed; he lost his appetite, and became uniformly dull and sleepy. A discharge of matter also took place from his ear. The pain and stiffness at length extended precisely over half his face, accompanied by a throbbing in his ear, and a slight catching sometimes in his neck. He also complained of a dull heavy pain on the right side of his head, particularly affecting his ear and fore-head. In the course of the first month after his admission, he was cupped on the temples and between the shoulders two or three times; bled from the arm to $\frac{3}{4}$ xx. and had, at three several times, six moxas applied on the affected side of the face; he took, also, some 5 gr. doses of calomel, followed by strong aperient medicine, by all which treatment he was so much weakened as to be overpowered by very slight exertion. However, after the cupping, he always felt relief, and in some degree after the bleeding; and he thought the pain in his face a little better after the application of the moxas. On the whole, he was much freer from pain than when he came into the house.

At this time, a seton applied in the nape of his neck gave relief to his head, but the pain began to extend occasionally to the left side of his forehead. The throbbing and pain in his right ear continued much the same. Recovering from his state of extreme weakness, the pains in his face increased, and became again as bad as ever; a stiffness in his neck was also perceptible on the right side.

September.—About the middle of this month, two blisters, applied in succession behind his right ear, diminished the throbbing considerably. The unguent. antim. tart. rubbed to his face has alleviated his pain. During the last four weeks he has been cupped five times, without any permanent benefit.

October 10th.—His dulness and sleepiness still continue, accompanied by loss of appetite. He requires medicine to keep his bowels open. The pain in his head is very severe. His head is ordered to be shaved, and two moxas to be burnt in every three days.

October 24th.—The moxas relieved the pain in his head where they were applied, but he still complains of severe pain in the forehead and down to the left ear. Ordered scruple doses of carbonate of iron, with hyd. sub. gr. ij. in each twice a-day. Having taken three doses of the carbonate of iron, his symptoms became worse, and the medicine was left off. His voice has now left him.

November 9th.—He describes his sensations to be such as if an immense weight were placed upon his head, and when he moves it, or begins to dose, he experiences a dreadful whirling sensation. This he has felt in some degree ever since he came in, but it has increased greatly within these two days,

so as to keep him continually awake. His throat appears choked up with something which prevents his speaking, except in a whisper.

In the following February he died, no material alteration in his symptoms having taken place, excepting their gradual increase, and that latterly a great and increasing discharge of mucus from his right nostril has taken place.

The post mortem examination discovered a large tumor arising from the dura mater, covering the middle division of the right side of the base of the skull, consisting of a number of encysted tubercles, filling up the hollow of the squamous portion of the temporal bone, thence (the bony matter which would have otherwise stopped its progress being destroyed) descending into the throat, and forming there a large conical pendulous projection.

The front of the tumor blocked up the posterior entrance of the nostril, and its right side that of the corresponding eustachian tube*.

CHOLERA AT CLAPHAM.

[We think it an act of justice towards Mr. Day to insert the following document.]

Clapham, Aug. 26, 1829.

The undersigned medical gentlemen were consulted on the late melancholy occurrence which took place at Mr. Day's school, Clapham.

After a very careful investigation of the cause of so unusual and terrible a visitation, it was discovered that a cesspool had on the preceding Tuesday been opened for the purpose of letting off stagnant water from the play-ground, occasioned by the late heavy rains, and that the contents of this had been removed to the garden. Upon a survey of all the circumstances, it is the belief of the undersigned medical attendants, that the pestilential effluvia arising from this source occasioned the catastrophe above alluded to.

It is due to Mr. Day and his family to state, that, prior to the discovery of what is believed to be the real cause of the disorder, diligent examination had been made of the various cooking utensils, and that an analysis had also been made by Dr. Burton, in London, of the several articles of food, as well as of the matters ejected from the stomachs of the sick, and that these were found to be in a satisfactory state.

The severe affliction which Mr. and Mrs. Day have experienced in the loss of their two children (the only cases of death which occurred), added to the intense distress they suffered from the alarming state in which seventeen of their pupils were during the whole of Sunday, calls for the deepest sym-

pathy of those who witnessed the scene; while the prompt and determined measures which they instantly adopted to meet the terrible evil, merit the highest approbation of those who professionally attended.

The undersigned are induced to hope, that as they have the power of stating that Mr. and Mrs. D. are strictly exonerated from even a shadow of blame; that as the occurrence is one that can never again take place; that as the conduct of the heads of the establishment was most praiseworthy and judicious, as well as efficient; that as the locality of their school is decidedly healthy;—under these repeated assurances they are induced to hope that the interests of an establishment so well conducted may not suffer in the estimation of the parents of their pupils, or others—a consequence which would greatly add to the affliction under which the bereaved parents are now suffering so severely.

WM. PEARSON, F.R.S. Surgeon, Clapham.

JOHN SPURGIN, M.D. 38, Guilford-street.

J. ANGAS, Surgeon, Clapham.

S. SANDERS, Surgeon, Clapham.

We the undersigned, having been called on to attend professionally during the progress of the late illness in Mr. Day's school at Clapham, beg leave to state, that in our opinion a sufficient cause for the disorder which we witnessed has been found in the effluvia from a cesspool, lately opened behind the house, as mentioned in the statement signed by Dr. Spurgin, Mr. Pearson, &c.

We take this opportunity of expressing, in the strongest terms, our entire approbation of Mr. Day's conduct, and that of the attendants upon the establishment, under all the great difficulties and distress of this unhappy event.

We are besides of opinion, that Mr. Day's house is airy and well situated; and that, as the cause has been ascertained, and is not likely to recur, there is no reason for apprehending a return of the disorder.

P. M. LATHAM, M.D. Grosvenor-street.

W. F. CHAMBERS, M.D. Brook-street.

BOOKS RECEIVED FOR REVIEW.

The Art of Prolonging Human Life; in which the subject is fully considered, both Philosophically and Practically. By Christopher Wm. Hufeland, M.D. First Physician to the King of Prussia, &c.

On a Morbid Affection of Infancy, arising from circumstances of Exhaustion, but resembling Hydrancephalus. By Marshall Hall, M.D. F.R.S.E. &c. &c.

ERRATUM.

In our last No. p. 410, in alluding to the account of the "morbus mucosus," for *Roideur*, read *Raderer*.

* Midland Reporter.

THE
LONDON MEDICAL GAZETTE,

BEING A
WEEKLY JOURNAL

OF

Medicine and the Collateral Sciences.

SATURDAY, SEPTEMBER 12, 1829.

ON THE DIAGNOSIS

OF

ANEURISMS OF THE AORTA,

BY

GENERAL AND STETHOSCOPIC SIGNS.

BY J. HOPE, M.D.

Member of the Royal College of Physicians of
London, &c. &c.

(Concluded from page 424.)

CASE VII.—*Aneurism of the Arch, &c.*

London, April 14, 1826.

THE subject of the following case was at Guy's Hospital. For the account of the dissection I am indebted to the pen of Mr. Dodd, late anatomical demonstrator to that Hospital; to whom I had given the diagnosis in writing a year previously.

Mr. Taylor, æt. 40, a tailor, tall, slightly built, meagre; has a great prominence, with pulsation, and slight discoloration of the skin below the left clavicle, over an extent of three or four inches in diameter. He complains of a heavy, gnawing, and throbbing pain, from the clavicle to the præcordial region, in the axilla, and on the left shoulder and scapula; numbness and impaired sensation of the left arm, and tingling of the hand when rubbed. These symptoms become intolerable when he lies on the right side, and he is prevented from lying on the left by aggravation of the pain in the shoulder. He is, therefore, restricted to the supine position. The slightest exertion induces a paroxysm of palpitation and dyspnœa. The voice is almost a whisper. Deglutition painful. The left pulse scarcely perceptible.

His complaint has come on gradually during a period of sixteen months. A

month ago he had dropsy, with orthopnœa.

Stethoscopic Exploration.

Pulsation.—Above the left clavicle, where the tumor is not perceptible, there is extremely little pulsation, and no "purring tremor." The left carotid is totally destitute of pulsation. Above the right clavicle there is an impulse slightly stronger than natural, and a scarcely perceptible purring tremor. Below the left clavicle the tumor pulsates more strongly than the heart, and its impulse is distinctly perceptible on the scapula.

Sound.—On the tumor there is a subdued, abrupt, rasping sound: it is more distinct above the left clavicle, but above the right it is remarkably loud. It is audible on the left scapula. This sound decreases on approximating towards the heart, and is at last superseded by a loud flapping sound proceeding from the dilated ventricles. The sound of the auricles is audible on the tumor, but less distinctly than in the præcordial region.

Diagnosis.—Circumscribed aneurism of the arch of the aorta. Its parietes thickened by layers of fibrine. The tumor depresses the aorta from the left super-clavicular region. The interior of the aorta is rough. The left carotid is obliterated. Ribs probably eroded*.

* I would not have it supposed that I am an advocate for such minuteness of diagnosis as is displayed in the present and many of the preceding instances. Minutiæ should be regarded rather as the instruments by which great general truths are developed, than as possessed of much intrinsic utility of their own; and it may be safely affirmed, that he who allows his attention to be unduly absorbed by them, is no more capable of comprehending the broad and important features of disease, than the connoisseur is qualified to judge of a great picture, who scrutinizes its merits through a microscope.

Necrotomy.—At the superior part of the arch, a little to the left, there is a very large aneurismal tumor, the parietes of which are extenuated, but strengthened by thick layers of fibrine. The subclavian artery rises from the summit of the tumor, and is obliterated at its origin, but pervious beyond. At the distance of three inches from the subclavian, the left carotid is discovered. It also is obliterated. The arteria innominata, which is not implicated in the tumor, is slightly contracted at its origin. The lower side of the arch is irregularly dilated, and the internal tunic of the ascending portion is indurated and uneven, from cartilaginous deposition. A considerable portion of the first rib is destroyed by erosion.

In this case, the thickening of the sac by fibrinous layers, and its interposition between the aorta and the super-clavicular region, were indicated by the obscurity of the sound on the tumor, and by the feebleness of the pulsation, and total absence of purring tremor above the left clavicle. It might be supposed that the obliteration of the subclavian was sufficient to occasion the deficiency of the two latter signs; but this is improbable, for a simple reason—that the subclavian, when pervious, is incapable of permanently generating the signs. Besides, it is probable that the subclavian was not obliterated at the time that the examination was made—namely, a year before the death of the patient; for it is noticed in the history that the left pulse was not extinct, though barely perceptible.

The loud rasping sound above the right clavicle bespoke the asperity of the interior of the ascending aorta, and the absence of pulsation of the left carotid denoted the obliteration of that vessel.

ROYAL INFIRMARY, EDINBURGH.

CASE VIII.—*Sacculated Aneurism of the Arch of the Aorta.*

Robert Hudson, æt. 40, a soldier, states, that two years ago, after a long and violent exertion in running, he was suddenly attacked with a pain between the left clavicle and the spine. He simultaneously experienced a paroxysm of dyspnœa, with nausea, and presently became sensible of a pulsation near the left clavicle, accompanied with numbness and dull pain in the arm. Four months subsequently, the surgeon of

his regiment discovered a considerable prominence near the top of the sternum, and, according to the report of the patient, he drew ten ounces of blood daily, till the sixteenth time, and ordered complete rest and the most scanty diet. By this treatment the tumor was diminished and the patient greatly relieved.

He is at present emaciated, and has deep-seated pains, in the chest, shoulder, scapula, and left arm, with numbness and debility of the limb. The pains are aggravated by a frequent cough. Dysphagia. Pulse 84, scarcely perceptible in the left radial *, and extinct in the carotid.

There is a tumor at the summit of the sternum, behind the origins of the left sterno-cleido-mastoideus muscle.

Pulsation is strong on the tumor and below the whole length of the left clavicle. It is perceptible as low as between the third and fourth rib. Above the clavicle it is feeble and without purring tremor, though this phenomenon exists in a very slight degree on the opposite side of the neck. The impulse of the heart is scarcely perceptible.

Sound.—An abrupt but feeble rasping sound is heard above the right clavicle; it is fainter above the left, very subdued below it, and, becoming progressively less distinct on approaching the heart, it is finally lost in the smart, clear, double sound of that organ.

Diagnosis.—Circumscribed aneurism of the aorta at the left end of the arch. Sac thickened by layers of fibrine. Inconsiderable dilatation of the arch, and roughness of the internal membrane.

Necrotomy †.—The patient died five months after admission. The left lung was compressed into a very small space, behind a voluminous aneurism of the aorta, extending from the summit of the sternum to the fifth rib, inclining to the left side, and reaching backward to the spine, opposite to the third and fourth dorsal vertebræ, of which it had caused the partial absorption. The tumor was chiefly confined to the transverse and descending portions of the arch, and it was nearly filled with organized coagula. The aorta, from its origin to the aneurism, was healthy. The left carotid rose from the summit of the tumor, and was plugged by fibrine to the ex-

* It became totally extinct five weeks previous to death.

† I am indebted for the account of this to my friend Dr. Nairne, who was charged with the case after I quitted the Royal Infirmary.

tent of three inches. The subclavian was small, and plugged at its origin by coagulated blood.

Though this diagnosis was correct in the important particular, the minor circumstances betray negligence. The obliteration of the carotid was overlooked, though its existence was palpable, and the "inconsiderable dilatation of the arch, and roughness of the internal membrane," were not sufficiently indicated by the signs. I have already stated that this condition causes preternatural pulsation above the clavicle, with purring tremor and a loud rasping sound; all of which symptoms were very deficient in the present instance. The situation of the tumor at the left extremity of the arch, was denoted by the pain in the left scapula, by the dysphagia, by the affection of the arm, and by the pulsation extending almost to the humeral extremity of the left clavicle. It is probable that the plugging of the subclavian took place when the pulse became extinct, five weeks before death.

ST. GEORGE'S HOSPITAL,

London, July 1829.

CASE IX.—*Dilatation of the ascending Aorta, and enlarged Heart.*

Thomas Oliver, æt. 52, a watchman, formerly a soldier; has œdema of the lower extremities; dyspnœa, particularly on ascending; slight orthopnœa; palpitation, induced by any exertion or mental emotion; pain across the præcordial region; cough; pulse full and strong on the left side, smaller on the right, remarkably jarring (purring tremor) during a paroxysm of palpitation; carotids pulsate strongly, and the jugulars undulate and are turgid; countenance anxious; complexion cadaverous; urine dark; bowels open; tongue whitish.

He was well until four months ago, when, "after hard running, he was seized as if broken-winded." From that time he has been subject to the palpitation and dyspnœa. The orthopnœa has existed six weeks, and the œdema only five days. He had rheumatism twenty years ago.

He has been bled ten times and cupped five, during the last four months.

He was ordered to be cupped to 3xij. ounces on the right hypochondrium, where he had pain. The depletion induced faintness. Pil. hydrarg. cum scillâ, elaterium, digitalis, and aperients,

were prescribed, and he improved for a fortnight. The dropsy then increased with prodigious rapidity, the paroxysms of dyspnœa became frightfully agonizing, and he sunk at the expiration of another week.

I examined this man with the stethoscope a week after his admission, and, without making notes of the particulars, wrote the following brief.

Diagnosis.—Dilatation of the aorta; hypertrophy and dilatation of the heart.

At that time the circulation was tranquil, and I did not find any bellows-sound of the heart, but that of the aorta was very feebly audible in the præcordial region. Accordingly, I did not believe that there was disease of the valves.

Stethoscopic Exploration, 33 hours before death, when in a paroxysm of dyspnœa.—Above both clavicles there is a pulsation, a purring tremor, and a hoarse abrupt rasping-sound. These signs are much more distinct on the right side than on the left. The sound is audible on the sternum, and in this situation it appears to be immediately under the ear, and has a less hoarse and more whizzing character than above the clavicles. Though it decreases gradually on descending, it may be traced to the præcordial region, where it is very obscure, and as if remote*. No pulsation is perceptible at the superior part of the sternum.

The impulse of the heart is much stronger and more extensive than natural, due allowance being made for the present accelerated state of the circulation. Resonance of the præcordial region is dull.

The sound of the ventricles at the former examination, was smart and loud; but it is now accompanied with a remarkably sonorous murmur, totally different from the bellows or rasping sound, and resembling the cooing of a dove†, though harsher.

Necrotomy.—*Lungs* are very œdematous, but their structure is natural. The right pleuræ adhere together by lax cellular tissue, which is infiltrated, and forms an intermediate stratum of a third of an inch thick.

Heart is at least double the natural

* This observation was made at the former examination, when the circulation was tranquil; and it led me to conclude that the murmur heard in the præcordial region proceeded from the aorta, and not from disease of the valves.

† This sound diminished as the paroxysm of dyspnœa subsided.

size. There is a small quantity of fluid in the pericardium.

Left ventricle: its parietes are three-quarters of an inch thick at the base.

Right ventricle: its parietes are about the natural thickness, but the columnæ carneæ are enlarged.

Valves are natural, except that the aortic are, perhaps, rather more substantial than ordinary.

Aorta: from the valves to the arteria innominata, its internal circumference is six inches; beyond, it is three. The internal membrane is overspread with opaque yellow depositions of fibro-cartilaginous appearance, by which it is thickened, and thrown into fantastical corrugations. At the divarication of the aorta, osseous scales are found on the membrane.

The right radial artery is smaller than the left, in consequence of an irregular subdivision above.

The predominance of the pulsation, sound, and tremor, on the right side of the neck, was owing to the dilatation being confined to the ascending aorta. The contiguity of the dilated portion to the sternum accounted for the whizzing character of the sound heard on that bone, as it was transmitted directly to the ear, without the intervention of any resonant medium; and this circumstance renders it probable that the peculiar hoarseness of the sound above the clavicles is referable to its reverberation through the chest before it arrives at the ear of the auscultator. A jarring pulse, such as existed in this case, is usually regarded as a sign of valvular obstruction. It has appeared to me to be more frequently connected with powerful action of the heart, and ruggedness, without obstruction of the aorta.

The peculiar sound which attended the ventricular systole might have created the belief that the aortic valves were diseased, if I had not known that the sound did not exist formerly during a tranquil state of the circulation, and that its nature was totally different from that which is characteristic of valvular disease.

Although the dilatation was considerable, and in the most favourable situation for producing a pulsation perceptible on the sternum, it had not that effect.

CASE X.—*Nervous Pulsation of the Aorta.*

London, December 1828.

A female, residing near Richmond,

æt. 22, married, of small frame, delicate fibre, and cadaverously pale complexion, had the following symptoms. Frequent palpitations and dyspnœa; a violent pulsation in the epigastric and umbilical regions, subject to exacerbations and remissions, but never ceasing entirely. No defined tumor could be felt, but there was much tympanitic distention of the abdomen. Pain, of an inconstant character, in the back, opposite to the epigastrium. No dropsical symptoms. Much nervous irritability. Pulse 110, small; tongue white; bowels regular from medicine; urine natural; suppression of the catamenia.

She never was subject to palpitation and dyspnœa till six months before I saw her. She ascribed the symptoms to protracted mental inquietude. The abdominal pulsation supervened rather suddenly, and she mistook it for the motion of a fœtus in utero, till it was ascertained, by examination per vaginam, that she was not pregnant. The pulsation increased, and was followed by the pain in the back.

She had been taking conium, hyoscyamus, colchicum, digitalis, and aperients, and had improved during the last fortnight.

Stethoscopic Exploration. — Both sounds of the heart are short, smart, and clear, but not more so than is natural to meagre, narrow-chested individuals. No bellows-murmur. The impulse of the heart is natural, but that in the abdomen is extremely violent. It may be traced by the cylinder from the scrobiculus cordis to the divarication of the aorta, and by pressing the instrument firmly down, the vessel may be felt to be of its natural calibre throughout. As the pulsation is not more extensive transversely in one place than another, it is evident that there is no defined tumor. The shock is a smart vigorous jerk, very different from the prolonged heaving of an aneurism. The sound is a whizzing, like that occasioned by blowing through a tube of an inch in diameter.

She entirely recovered under the use of antispasmodic and aperient medicines, followed by tonics.

It was manifest, from the following considerations, that this was not a case of aneurism, viz. that the palpitation and dyspnœa succeeded mental distress; that the abdominal pulsation commenced suddenly; that an aneurism could

not pulsate so extensively without manifesting a tumor; that a tumor capable of generating so extensive a pulsation could not have been developed suddenly, without occasioning some local pain or functional derangement; that the pain in the back was intermittent; that the nature of the impulse and sound were different from those of aneurism; that the aorta, when traced with the stethoscope, seemed to be of its natural calibre; and that the general symptoms and history were those of a nervous affection.

ON BLOOD-LETTING.

To the Editors of the London Medical Gazette.

GENTLEMEN,

I WAS present during the course of the last winter, at the reading of Dr. Marshall Hall's paper on blood-letting, before the Medico-Chirurgical Society; and I afterwards read the report of that paper, and the additional remarks of the author, in your Journal, Nos. 54 and 57. I took a deep interest in the principles detailed, and determined to submit them to the test of experiment and observation.

The result of my attention to the subject I beg to lay before your numerous readers. It may induce them to pursue the inquiry for themselves, and to follow my example in submitting the facts they may observe to the profession.

The first thing I did was to look over various medical writings, with the view of ascertaining whether there were already any facts upon record bearing upon the question. I soon found, upon your own pages, many cases in point; and first, the very interesting one of Dr. Badeley, in your 13th number (for March 1828), page 368; my attention was next excited by the account of a case by Mr. Smith, which almost immediately follows your report of Dr. Hall's paper, in your 54th number, page 63; and again by the case which immediately follows Dr. Hall's own communication, in your 57th number, page 158, by Mr. Darby. Dr. Badeley's and Mr. Darby's cases are given expressly to show how much blood may

be borne to be lost under some circumstances, and they are *both* cases of pleuritis. In Mr. Smith's case, the patient never "rallied after the blood-letting," and it is a case of *delirium tremens*. My attention is once more forcibly drawn to this subject by a paper in your number for August the 8th, page 300, by Mr. Newstead, entitled "Remarks on a peculiar class of diseases resembling Inflammation." Mr. Newstead observes, "I was astonished at the small quantity of blood which commonly flowed before syncope was produced*," &c. Lastly, my attention has been drawn to this subject more forcibly than ever, by the perusal of Dr. Gooch's recent work, entitled "An Account of some of the most important Diseases peculiar to Women." In this work two kinds of puerperal disease are described: the first is inflammatory, and bears blood-letting; the second is different from inflammation, and in these blood-letting led to early syncope, and if injudiciously used or repeated, to a fatal termination.

The general result of this cursory glance, chiefly over your own pages, is, that some diseases bear blood-letting remarkably well; others, remarkably ill. But it may be said that this has been long well known. This is true; but has the principle been *accurately* traced—has it been made of any practical utility—has it been made available as a guide for the use and measure of blood-letting, and as a diagnostic? I venture to say that it has not; and to add, that those who will take the pains, which I have done, to possess themselves of the facts involved in this inquiry, will find themselves richly rewarded by the confidence with which they will thenceforth prescribe or adopt the measure of blood-letting, in cases in which they might otherwise have been long held in doubt and suspense.

I will now proceed to the detail of my own experience since I adopted the mode of blood-letting proposed by Dr. Marshall Hall. I shall first give my cases in the form of table, according to the plan laid down by that author, and I shall then add a few illustrative remarks upon them.

* I would remark, that Mr. Newstead's observations, however interesting, are entirely anticipated by Dr. Hall, in his remarks on intestinal irritation, &c.; and rather denote the propriety of some new and appropriate denomination for this class of cases.

REGISTER OF

No. and initials.	Age and strength of the patient.	Disease, its state and complications.	Quantity of blood taken.
			Oz.
1, Mr. P.	35, very strong.	Fever, with pain in head.	iv.
2, Mr. P. S.	35, not very strong.	Giddiness, with sickness.	x.
3, Mrs. —	24, rather strong.	Pain in the head, giddiness.	xvj.
4, Mr. B.	24, strong.	Pain in the head.	xv.
5, Mrs. F.	24, strong.	Pain in the head.	vij.
6, Mrs. B.	25, weakly.	Intestinal irritation.	ix.
7, Mr. B.	23, middling stature.	Bronchitis.	xvj.
8, Mrs. —	34, strong.	Bronchitis.	xv.
9, Mr. C.	46, strong.	Bronchitis.	xv.
10, Miss C.	{ 21, strong consti- tution. }	Dysentery.	xv.
11, Mr. S.	60, strong.	Threatening of apoplexy.	xviiij.
12, Mr. B.	30, strong.	Pain in head and paralysis.	xxx.
13, Mr. S.	26, strong.	Phrenitis.	xlix.
14, Mrs. F.	28, strong.	Pleuritis.	xxx.
15, Mrs. S.	27, tall, not strong.	Pleuritis.	xxx.
16, Mrs. T.	{ 23, strong consti- tution. }	Pleuritis.	xxx.
17, Mrs. G.	24, strong.	Hepatitis.	xxxij.
18, Mrs. G.	{ 21, strong consti- tution. }	Hepatitis.	xxvj.
19, A. C.	7, a weakly girl.	Hepatitis.	viiiiss.
20, Mrs. T.	33, strong.	Hysteritis.	xxxij.
21, Mary —	24, weakly.	Chronic hepatitis.	xviiij.
22, Mrs. L.	{ 40, rather strong, pregnant. }	Hepatitis, of long standing.	xxxix.
23, Miss F.	23, not very strong.	Peritonitis.	xxxij.
24, A. N.	9, not strong.	Peritonitis.	xx.
25, Mr. W.	25, not very strong.	Acute rheumatism.	xxxvj.
26, Miss O.	12, weak.	Hepatitis.	xvij.
27, Mrs. J.,	50, strong.	General anasarca.	xxx.
28, Master O.	5, not very strong.	Pleuritis.	vj.
29, Master G.	7, not strong.	Pleuritis and tracheitis.	x.
30, Miss G.	16 months, strong.	Pleuritis and tracheitis.	v.
31, Master T.	5, a strong boy.	Pleuritis.	viiij.

CASES OF BLOOD-LETTING.

Effects on the patient and disease.	Appearances of the blood.	Repetitions of the blood-letting.	Effects.	Remarks.
1, Complete syncope.	....	....	Recovered.	
2, Syncope; relieved.	{ Neither eupped nor buffed. }	....	Recovered.	
3, Syncope.	Not buffed or cupped.	....	Recovered.	
4, Syncope.	....	....	Recovered.	
5, Syncope.	....	....	Recovered.	
6, Syncope.	....	....	Died.	{ No morbid appearances. }
7, Syncope.	{ Crassamentum dark and loose. }	xv. oz.	Syncope; recovered.	
8, Syncope.	Buffed, not cupped.	....	....	{ I did not see her again. }
9, Syncope.	{ 1st time not buffed, 2d time buffed and cupped. }	xij. oz.	....
10, Syncope.	Dark.	Leeches.	Faintness; recovered.	
11, No dispos. to syncope.	....	{ Cupped to xvj. oz. }	No syncope; recovered.	
12, Syncope.	....	....	Recovered.	
13, Syncope.	....	....	Recovered.	
....	....	Leeches.	Recovered.	
14, Syncope.	....	Leeches.	Recovered.	
15, Syncope.	Buffed and cupped.	....	Recovered.	
16, Syncope.	Buffed, not cupped.	....	....
17, Approaching syncope.	Buffed.	....	Relieved.	
18, Incomplete syncope.	....	Leeches.	Recovered.	
19, Syncope.	Buffed.	....	Recovered.	
20, No syncope.	....	....	....
21, Syncope.	....	{ xxxix oz. in 12 hours. }	Syncope; greatly relieved.	{ Died 4 months afterwards; liver enlarged and indurated. }
22, Syncope.	Buffed, not cupped.	Leeches.	Recovered.	
23, Syncope.	Buffed.	....	Recovered.	
24, Syncope.	....	....	Recovered.	
25, Syncope.	Buffed.	....	{ Pain relieved, but not the tenderness. }	
26, No syncope.	Buffed, not cupped.	Leeches.	Recovered.	
27, No syncope, or relief.	Buffed.	Leeches.	{ Faintness, and relief from pain. }	
28, Without syncope.	....	....	Without relief.	
29, No syncope.	....	....	....
30, No syncope.	....	Leeches.	Recovered.	

I will just observe, that I have not given all the cases in which I have bled since I began this inquiry, but have selected only those about which I felt most certain as to their real nature. The limits of such a paper as the present will necessarily compel me to be brief in my observations on the cases which I have given in the table.

Nos. 2, 3, 4, 5, 6, were unattended by any inflammatory affection, and in each there was considerable disorder of the stomach and bowels, indicated by the alvine evacuations being discoloured, offensive, and scybalous; the tongue loaded, particularly at the back part and middle; and the breath offensive. The average quantity of blood lost in all these cases was very small; and in No. 4, although a strong young man, complete syncope was produced by the loss of ℥xv . and the fainting returned for some hours, whenever the body was raised up.*

Nos. 7, 8, 9, 10, were cases of inflammation of the mucous membranes, and in these it will be observed that the average quantity of blood lost was about ℥xv .

Nos. 11, 12. The former is a case where, from the age, habit, and symptoms, I supposed the patient to be threatened with apoplexy; and it will be seen that the loss of blood was considerable, for the age of the patient, without producing the least disposition to syncope. The latter was a case of slight paralysis, occurring in a man of strong constitution and florid countenance; and the loss of blood which he sustained before fainting was equal to that which was borne by some of the patients who had inflammation of a serous membrane. With the exception of one, a case of convulsions, occurring in a child with whooping-cough, all the others were those of inflammation of serous membranes or parenchymatous substance: in these the quantity of blood lost was very large, particularly in the case of peritonitis, No. 24, a girl only 9 years of age, not particularly strong; she had been affected two months before with measles, which was succeeded by general anasarca; the latter complaint was removed by purgatives, and in ten days after she had an attack of peritonitis. I saw her eighteen hours after the commencement of pain; she was lying on her back, with her knees drawn up; her breathing quick

and painful, and her belly swollen, and so tender, that she cried out upon the slightest touch: ℥xxx . of blood flowed before there was the slightest disposition to faintness; when syncope came on, it did not occur to an excessive degree; and upon recovering from this state, she had lost her pain and tenderness, which never returned. It is remarkable, that from the loss of so large a quantity of blood she sustained but little inconvenience, and was well in a short time*.

The inflammatory affection in the children, Nos. 28, 29, 30, 31, came on in consequence of measles; the two latter on the fourth day of the eruption, the former on the third day. This little boy I did not see after I bled him, but was informed by the medical gentleman whose patient he was, that twelve leeches were applied, and he ultimately got well.

The patient No. 16, had suffered with tenderness about the region of the liver, with hardness and enlargement at that part for some months; but at the time I bled her, her complaint assumed more an acute character than formerly, being attended with considerable pain. The pain was relieved, but there was still remaining some tenderness and enlargement.

The general results of these cases, and of my experience, coincide entirely with the statements made by Dr. Hall. Some diseases enable the system to bear blood-letting; others render it incapable of bearing loss of blood. The former are, congestion or inflammation within the head, inflammation generally, but chiefly of the serous membranes and parenchymatous substance, and least, that of the mucous surfaces; the latter are, some cases of delirium, and of variously seated pains and tenderness unattended by inflammation, but connected with intestinal disorder, previous loss of blood, and what must still, I fear, be termed a nervous condition of the system. I add a case or two which could not be so well recorded in the table.

One case of affection of the head, arising from other causes than inflammation, yet attended by many of the symptoms of phrenitis, I witnessed in a near relative: syncope was induced by withdrawing ℥ix . of blood. I was called to what I considered a similar

* There is scarcely a case on record in which so much blood was drawn at this early age.

case, and sent my assistant to bleed her, and stated before he returned that there would be early syncope: he abstracted ℥xl. of blood! I was surprised at the result; but on inquiry and reflection, it was perfectly accounted for. The patient had bled ill, and much time was lost in taking the blood; in such circumstances I would remark that more blood may be taken, even if the patient be erect, than he may be able to bear. But besides this, there was a state of chronic inflammation of the hip-joint, which I did not think of at the moment; this enabled her to bear the loss of a large quantity of blood.

I bled a young person, aged 21, of moderate strength, and affected with fluor albus, two months ago, and again a fortnight ago, at her own request. She had been accustomed to this kind of discipline. She fainted each time on losing ℥xij. I saw this patient yesterday, labouring under rubeola, with an inflammatory affection of the chest. I bled her in the same manner to slight syncope, and she lost ℥xxxij! To-day she is greatly relieved, and doing well. So obvious is the protective power of inflammation, and so practical and diagnostic is this mode of blood-letting.

Some time ago I bled a stout man, aged 35, (No. 1) on the eleventh day of fever; he was flushed, his skin hot, and his pulse 120; he fainted on losing ℥iv. of blood. On the next day I found him much better, indeed convalescent.

On two different occasions I bled the same patient, with inflammation of the mamma, and afterwards in cholera morbus. In the former case she lost ℥xx. of blood; in the latter she fainted just when ℥iv. had flowed.

I must also add, that the proper mode of performing the operation of blood-letting is, first, to prepare the arm; then gently to raise and support the patient; and then to make a free opening into the vein. If the blood flows well, I think the rule is safe; if it flow slowly, too much might be taken, and especially if it become necessary to open another vein. I have observed that if syncope be allowed to take place under a slow detraction of blood, convulsions are more apt to occur than when the flow of blood is prompt and rapid.

If, gentlemen, these remarks excite the attention of others whose opportunities for observation may be greater

than that afforded by my own Dispensary, to this very interesting and important inquiry, I shall not think I have occupied your pages in vain.

I propose shortly to beg the favour of your insertion of a few puerperal cases, which I have carefully watched with the view of ascertaining their distinctive marks and appropriate treatment.

I am, gentlemen,

Your obedient servant,

G. OAKLEY HEMING.

Kentish Town, Sept. 1829.

OBSERVATIONS

ON

OBLITERATION OF THE VAGINA.

BY CÆSAR HAWKINS, ESQ.

Surgeon to St. George's Hospital.

CATHARINE H. æt. 27, admitted for amenorrhœa, with the following history. In November last she was delivered of her first child, which was still-born, by means of instruments. She suffered much during her confinement, and was very ill for some time afterwards, but recovered her health during the month. About a month after her confinement she had the usual precursory symptoms of menstruation, but no discharge of the secretion took place; and each month since that time (the last being the sixth period since her confinement) the symptoms have returned with increased severity at each successive period. She has much pain in the hips and loins, pain and bearing down in the vagina, sickness, slight febrile symptoms, with general disturbance of health. The abdomen swells, and is tender and painful, and she suffers much from flatulence, and experiences considerable difficulty in emptying the bladder or rectum, though there has been more or less difficulty in passing either evacuation even during the intervals between the periods of menstruation. These symptoms continue for nine or ten days, and then subside, leaving her comparatively well. The abdomen, however, has not lately recovered its proper size upon the subsidence of the other symptoms, but remains considerably swollen, though less than during the menstrual periods. She

did not suffer much after her confinement from the lacteal secretion, but has been constantly obliged to use liniments to the breasts, as, at each menstrual period, the breasts enlarge and become painful, and milk is secreted in such quantity as to escape from the nipples even without pressure.

At the request of Dr. Seymour, under whose care she was admitted, I examined her, and found the vagina totally obstructed by a very firm membrane, drawn in and puckered towards the centre, and feeling like cartilage. On passing a catheter into the bladder, the urethra was perceived to be pushed up behind the pubes as if by pressure, so as to require the point of the instrument to be turned nearly perpendicularly, instead of in the usual oblique direction. When the water was drawn off, a firm tumor could be distinguished by pressure on the abdomen, and a considerable prominence could also be felt by the finger introduced into the rectum beyond the point of obstruction, though no distinct sensation of fluctuation could be felt either at the obstructed point nor on the abdomen, nor in the rectum.

It seemed evident, however, from this examination, that the uterus and upper part of the vagina were distended with thick substance, so as to obstruct the passage through the rectum and urethra, and it was probable at the same time that the obliteration of the vagina did not extend very far.

May 27th.—The patient being placed on a table, nearly in the position for the operation of lithotomy, I made a transverse incision, about half an inch in length, in the centre of the hardened cicatrix, and after dividing it cautiously, about three quarters of an inch upwards, I reached the distended portion of the vagina, through which a thick red semifluid substance, without smell, flowed to the amount of about twelve ounces before she was placed in bed, after which about a pint more came away slowly, during the next thirty-six hours, without pain or inconvenience.

29th.—This morning the discharge became completely purulent, all the brown matter appearing to have come away; and about the same time that the nurse observed this change, the patient was seized with rigors, pain in the abdomen, and frequent vomiting. She has now an anxious countenance.

Bowels not open since yesterday. Pulse 120, weak and small. She has twice taken some infusion of roses and Epsom salts without effect. As both Dr. Seymour and myself believed the symptoms to be those of irritation without inflammatory action, I injected some warm water into the vagina, to wash away the purulent secretion; an enema of castor oil was administered, and the following pills exhibited, which were repeated twice in the course of the day:

Rx Pil. Sapon. c. Opio, gr. v.

Galb. Comp. gr. v. M. ft. Pil. ij.

In the evening, the bowels having been twice opened, she became easier, with less frequent vomiting, and the pulse was less frequent and more full.

30th.—The discharge continues purulent, but in smaller quantity. The injection was repeated. The sickness is gone; the bowels have been again opened twice this morning; the pulse 110; countenance less anxious. There is still, however, a good deal of pain on the slightest motion, and pain is produced by pressure in the situation of the uterus, though not elsewhere.

Rep. Pil. Vespere:

31st.—There is now no pain or tenderness of the abdomen, and no pain on turning in bed. Tongue covered with a thick white crust. Pulse 116. She has eaten nothing these two days, but is not now sick. Ordered a small quantity of wine. She is menstruating, the proper period having arrived, and, in fact, she has not suffered so much the last two days as she generally has done before the late abortive attempts to get rid of the secretion; so that the symptoms during the last two days may have been as much owing to the state of the uterus from the performance of this function as to the irritation excited by the operation.

June 4th.—The tongue is clean, and she has gone on well till to-day, when a good deal of pain and tenderness returned on the right side of the abdomen, where a tumor is perceived, apparently in the situation of the ovarium, and there is also a good deal of nausea and sickness.

Hirud. vj. parti dolenti.

Rx Mist. Camph. 3x. Træ Castorei, 3ss.
Træ Opii, ℥v. M. 6tis horis.

These symptoms subsided, and the next day no tumor was perceptible, the

pain and tenderness gradually ceased, and on the 9th there was no longer any local or general irritation. Weiss's dilator was now employed for some hours, which produced considerable pain by the distention, with a little bleeding from the cut surface; the pain went off, however, and the instrument was employed every day for some time; after which bougies were used, which caused less irritation than the dilator, and appeared equally efficacious. Under this treatment, which was attended with copious purulent discharge, the strictured part was gradually dilated, so that, instead of a hard circular band, more than half an inch broad, and feeling like cartilage, the surface became equally smooth and nearly as pliable as the rest of the surface of the vagina, though the canal still remained smaller than it should be. She was impatient, however, to return to her home, and promised to come again to the hospital if she experienced any inconvenience.

There is a great variety in the congenital deformities, or accidental adhesions, or new growths, which are found in the generative organs of females, producing some impediment in their different functions; some of which are of little consequence and easily remedied, others are of more importance, and require the most delicate and skillful surgical operations for their cure.

Nothing is more common in young infants than for some adhesion to take place between the sides of the labia, uncleanliness or some other cause producing inflammation of the mucous membrane; the adhesion being such as occasionally to leave only a small opening near the urethra, and to draw attention by the pain or inconvenience experienced in micturition. The remedy for this adhesion is very simple; the forcible separation of the labia by the thumbs or the probe, or a slight incision with a knife, being sufficient to lacerate the adhesion; and a little piece of lint, dipped in oil, preventing their subsequent cohesion.

Sometimes, again, there is such a prolongation of the hymen over the orifice of the urethra, as to produce much difficulty in making water. A case of this kind is related by Warner, in his cases in surgery, in which the symptoms resembled those of stone;

and after existing several years were cured by an incision. The most remarkable instance of this sort, however, is one related by Cabrolus, (*Obs. Anat.*) in which the hymen was imperforate, and the urethra completely obstructed, so that no urine could be discharged by the natural passage, but it was evacuated from a tumor, projecting about four inches from the navel, and formed probably by the urachus. Cabrolus made an incision into the urethra, and tied the tube projecting from the abdomen; the patient, who was nearly twenty, being cured. In the *Phil. Trans.* there is an account of a case where the urethra was similarly obstructed by caruncles growing from the orifice after delivery.

Besides these malformations, which obstruct the flow of urine, and may therefore be discovered and remedied in children, there are other natural and accidental impediments to the sexual functions, the existence of which is not usually ascertained till the time of puberty or marriage. The obstruction may be either partial or complete; and it may be situated at the orifice of the vagina, or higher within this passage, or in the mouth of the uterus itself.

The hymen is often so firm in texture, that although an opening in the centre allows the menstrual secretion to be discharged, yet an incision is necessary for the consummation of marriage; or (if conception has taken place in spite of this obstacle) to facilitate parturition, such an incision being easily effected, as a director can be passed through the opening, and thus all risk is obviated. Ruysch (*Obs. Chirurg.*) met with an instance in which a second membrane was found higher than the hymen, and requiring a second incision during parturition. A similar partial obstruction to the function of generation is formed by contraction of the vagina, from the use of strong astringents, (*Saviard, Obs. Chir.*) from small-pox, (*Beckerus de Paidioctoniâ inculpatâ*), from lues venerea, (*Benivenius de Abdit. Morbor. Caus.*); and still more frequently from accidental lacerations and cicatrices in consequence of violence during parturition, of which numerous instances are met with in several authors, which have been cured by tents, by several small incisions round the obstructed part, by dilatation on a director, &c.; great care being necessary to keep up the dilatation for a considerable time, to prevent subse-

quent contraction. The most remarkable instance of this obliteration, while the menstruation continued, is in Beecher, (*op. citato*), as the secretion was discharged by the rectum; and pregnancy took place pseudothyro intro-missis voluptatibus; the laceration, and subsequent cicatrization, having been so extensive as to obliterate the whole of the vagina intermediate between the urethra and rectum.

In these cases of partial obstruction, where pregnancy has taken place, it is probably advisable to operate as early as possible, so that dilatation may be effected, and the parts properly cicatrized before delivery; there must otherwise be considerable danger of more extensive laceration taking place during the expulsion of the child. The operation is one which necessarily requires great caution; but as an opening exists, through which conception has occurred, there is at least a certain guide to the operator, who is in much less danger of injuring the bladder or rectum than in cases of complete obliteration, though the difficulties have appeared so great that Smellie even advises the performance of the Cæsarean section where there are large cicatrices and adhesions in the vagina and os uteri. Callisen also gives directions for the vaginal Cæsarean section, where the os uteri has been closed by inflammation.

The malformation becomes still more serious when no orifice is left by which the menstrual secretion may be evacuated; this fluid being thus retained in the uterus and vagina, producing great disturbance of the health, and even becoming fatal if not discovered in time for the performance of a proper operation for its cure. The symptoms arising from retention of the menses from such a cause are accurately described by Sabatier (*De la Médecine Opératoire*), copied into S. Cooper's *Surgical Dictionary*, (*Art. Vagina imperforate*). One circumstance, however, scarcely adverted to by Sabatier, is the sympathy of the mamma with the uterus, exemplified in the case I have narrated, and which sometimes proceeds so far as even to establish a vicarious secretion from this gland; the same thing having also been observed, "*per vias aeríferas, urinarias, alvum, digitos, cicatrices, oculos, nasum, aliasve partes.*"—(*Callisen*).—Of course, however, some exaggeration or misconception has arisen in

many of these cases, so that I would not be considered as a believer in many of the cases referred to in the quotation.

The similarity in the symptoms of such cases to those arising from pregnancy, and the injurious suspicions often excited, have been frequently pointed out; the resemblance they bear to cases of amenorrhœa, and the necessity of manual examinations, are also evident from the instance just related. The operation for imperforate hymen is generally a very simple one, as the fluid retained in the vagina and uterus distends the membrane, so as to point out exactly where the incision is to be made. It must not be forgotten, however, that the operation, however skilfully performed, is not wholly unattended with danger. In the last instance in which I witnessed the operation, the patient died in consequence of inflammation of the peritoneum. The fluid which is retained is in general perfectly free from putrefaction, however long the disease may have lasted, (*see Mem. de l'Acad. de Chir.*) though the rule is not without exception, (*Sabatier, op. cit.*) Where putrefaction takes place, death may often result from the irritation produced by this cause on the constitution; and even where it does not occur, yet suppuration ensues after the retained fluid has been evacuated, and the employment of opiates and soothing injections becomes necessary, to obviate the irritation which is excited. But some danger arises from the mere quantity of the retained fluid, which may be so great as to produce rupture of the fallopian tubes into the cavity of the peritoneum, (*De Haen, Ratio Medendi*). Smellie mentions a case where three pints and a half were discharged by operation; and half a pint more came away subsequently, of the consistence of butter-milk; a quantity sufficient to distend the uterus, as in a case of pregnancy; and in the absence of the natural contraction of this organ, very likely to be followed by severe irritation, or fatal inflammation. In the case I have narrated I carefully abstained from pressure, but allowed the fluid to be expelled by the contraction of the uterus, and the pressure of the abdominal muscles; the discharge in this manner taking place very slowly in consequence of the consistence of the fluid, which is usually like treacle. Attention to this rule I believe to be the

principal means of avoiding dangerous results.

Where the malformation is situated not at the orifice, but within the vagina, an operation becomes much more difficult and dangerous. Sir Astley Cooper mentioned to me a case in which he had made incisions to form a passage to the uterus, and had cut through not less than two inches of membrane without perfectly exposing the cervix uteri, though the result was successful, as it was followed by pregnancy. A lady, after eight years suffering, was operated on, and the surgeon passed his finger into a large cavity, from which a good deal of blood escaped, and which was believed to be the vagina; the patient died, however, in three days, and it was discovered that the cavity was that of the bladder, the death having been the consequence of the escape of the menstrual secretion into the abdomen, from a rupture of one of the Fallopian tubes. —(Sabatier, *op. cit.*)

The difficulty of the operation is necessarily still greater when the obliteration is situated in the orifice of the uterus itself, (not the os uteri in the sense in which the term is employed by many authors, who allude to the subject of this paper, by which they mean the vagina,) unless the cervix is distended and elongated by the fluid so as to communicate a sense of fluctuation to the finger. Several directions for opening the uterus when thus enlarged, and containing menstrual fluid, or when the cervix is obliterated subsequent to impregnation, will be found in Callisen, *Syst. Chir.* vol. 2, ccccxlviii.

Callisen (*op. cit.*) remarks, "*Accidentalis vel symptomatica vaginæ concretio totalis vix unquam occurrit.*" Such cases are, no doubt, more rare than the instances in which some small passage remains open for menstruation, and have been seldom recorded by modern surgeons, while much attention has been bestowed on the less important cases of imperforate hymen, a neglect which has induced me to throw together these remarks; but several cases are described by older authors, and I refer particularly to Beckerus "*De Paidiotoniâ inculpatâ,*" and Roonhuyse, "*Med. Chir. Obs. Englished out of Dutch by a careful hand.*" The latter author, for instance, relates a similar case to that which I have detailed, where a woman had her vagina so completely

obliterated by gangrene after delivery, "that she never had her menses any more." Having dilated the vagina with a speculum, the closed part was opened from above downwards by a lancet tied to the end of the finger. A pessary was afterwards employed, but neglected by the patient, and in a subsequent confinement a further operation became necessary, but the patient was allowed to be so long in labour before it was performed that she died in three days.

These cases of obliteration of the vagina after delivery, are much more difficult to relieve by operation than most of those in which there is a congenital deficiency. It is probable that they scarcely ever occur without considerable loss of substance by sloughing, the consequence of which is the approximation in a greater or less degree of the rectum and bladder and urethra to each other, and their junction by a hard semicartilaginous cicatrix, unyielding, and difficult to divide. The intricacy and difficulty of the case are necessarily dependent on the extent to which the obliteration has taken place; whether the sides are only brought together, or two or three inches of the vagina are firmly united, as in the latter case there will not be the distention of the vagina above the obliteration, separating the bladder and rectum from each other, and defending them where they are most loose, and where there is consequently greater risk of injuring these viscera. The operation becomes still more delicate when the sides of the uterus are also united together, which appeared to be the case in a patient of my friend Mr. Mayo, on whom he twice performed an operation (at the last of which I assisted), and succeeded in restoring part of the canal, though not in reaching the cavity of the uterus. There was in this case, however, no accumulation of menstrual secretion, and the health of the patient was restored, so that in all probability great part of the cavity of the uterus was obliterated, and the function of menstruation gradually ceased.

The operation is generally directed to be performed by making a perpendicular incision, but it appears to me to be much better, in most cases, to cut through the cicatrix transversely, *i. e.* with one flat side of the scalpel towards the rectum, and the other towards the bladder; in which direction, I imagine,

with attention to the anatomy of the parts, there must be much less risk of wounding either of these viscera than when the edge of the knife is held upwards or downwards, and there can scarcely be any risk of injuring the peritoneum, as the vagina is so little connected with it, that the puckering of the cicatrix is not likely to implicate this membrane. I need only repeat the necessity of attending to the after treatment, in the same manner as after the operation for imperforate hymen, and to the emptying both the bladder and rectum in all these cases previous to the operation.

LITHOTRITIC PROCESS.

To the Editor of the London Medical Gazette.

SIR,

YOU have already favoured the medical public with an account of the demonstrations given by the Baron Heurteloup, of the application of instruments for the purpose of crushing and pulverizing calculi in the human bladder. I now beg to offer you the details and result of a case where the process appears to have succeeded completely, without having subjected the patient to any disturbance of the constitutional health, and with the least local inconvenience imaginable.

Mr. Wattie, of Chelsea, aged 64, a gentleman many years subject to gout, became my patient about six months ago, and related symptoms which at first induced me to suspect that a morbid condition of the prostate gland and bladder was the cause of all his "misery by night." He was subsequently sounded, but the irritability of the bladder was such as to render the inquiry very unsatisfactory. However, on a second examination, the sound struck upon a polished or hard stone, the patient at the same time exclaiming, "You have found a stone; I hear it distinctly." He was unwilling to hazard the ordinary operation, and as his countenance expressed in no slight degree the probable existence of unsound viscera, combined with feeble health, it was not recommended.

On the arrival of Mons. Heurteloup in this country, and after having with

many others witnessed the apparently admirable adaptation of his mechanical contrivances for the destruction of stone in the bladder, added to the success which I was aware had attended his operations in Paris, my patient was prevailed upon to permit the Baron to examine the bladder, for the purpose of ascertaining the existence of a stone. On the 20th of July the bladder was injected with tepid water, through a small silver catheter, very slightly curved about three inches from its extremity, and which serves also as a very superior instrument, not only for discovering a calculus, but also for ascertaining, with tolerable precision, its size and external character, and in some cases the number. On this occasion, from the sudden and violent impatience of the bladder, with forcible contraction, an opportunity was barely afforded to detect the presence of a small stone. July 24th, the bladder was again injected, a small stone instantly discovered, the three-branched instrument with a simple drill was passed, the calculus quickly seized, and in less than fifteen seconds it was broken into fragments: the instrument was now withdrawn, and the patient immediately evacuated the tepid water which had been previously injected. A full-sized elastic catheter, having two very large apertures or "eyes," was now introduced, through which tepid water was again injected, and immediately suffered to return, bringing with it a few small fragments, and the "detritus" produced by the drill. The whole process did not occupy beyond five minutes. July 28th, several small fragments were passed; on the 29th one of considerable size; and on the 30th the bladder was again injected, and the catheter used as a sound, to ascertain if any fragments yet remained, which was found to be the case. The three-branched instrument was again introduced, and not only some fragments, but also other small stones, were detected; to break down which, the simple compression of the branches, aided by the twirling of the drill with the fingers, was sufficient. This *seance* did not occupy more than six minutes. During the next six days a few small fragments were alone passed, and on the seventh, for the purpose of ascertaining the reason, the bladder was again examined, and many frag-

ments detected. As some degree of soreness in the urethra had existed, from the last operation, it was thought prudent, for the present, not to interfere. Two days subsequent to the last inquiry, a large fragment, followed by many small ones, were passed: on the 10th, two of considerable magnitude, also with several others. On the 20th the bladder was injected, and examined with the catheter, but *this* instrument did not discover any fragment, or stone: the three-branched instrument was again passed, a small fragment detected, and, in a few seconds, was reduced into minute particles, which were very quickly evacuated with the urine. A very minute examination of the bladder, and a total absence of every symptom indicative of any mechanical source of irritation, warrants the inference that no portion of stone now remains in the bladder, and that the operation has completely succeeded.

Considering the great importance which is attached to the successful introduction, and permanent adoption, of an operation such as this in our country, the most favourable case in point of age, health, and local circumstances, as an example or *débüt*, should have been selected; as a failure at the outset might possibly have had the effect of creating a premature inference, and abandonment of a process which, I feel assured, would still have consigned many either to the chance of a dangerous and doubtful operation, or to permanent pain and misery. At the commencement of this record, I have very briefly mentioned the history of the case, with the details of operation; but to shew how, under very unfavourable circumstances, a happy result has been obtained, I beg to give a more minute account of the symptoms, morbid sensibility, and probably altered structure of the bladder, in this case, from local irritation.

Mr. Wattie had suffered with symptoms of gravel nearly two years, and he has become considerably crippled in the feet with frequent and severe attacks of gout, while his countenance and general appearance indicate a greater age than he really is, and a state of health far from good. During the last year, or nearly so, to the kidney or gravel pains have been added, not only a frequency of evacuating the contents of the bladder, but also the usual symp-

thetic annoyance along the course of the urethra and in the glans penis. The urine turbid, occasionally a little bloody, and always depositing a considerable quantity of "glair," the adhesive properties of which to the *pôt de chambre* is well known to practical surgeons. Latterly, the irritability of the bladder had increased to a degree, such as to demand the evacuation of its contents every hour during the night. I may here mention, by the way, that large doses of carbonate of soda had the effect of diminishing considerably the irritability and frequency of passing the urine. The prostate was also ascertained to be much enlarged, and on passing a sound, the contraction of the bladder was instantaneous, giving to the instrument that curious vibration of which every experienced person must have had examples, and which is indicative of extreme morbid sensitiveness.

Such was the subject which alone offered itself to our foreign *confrère*, who at first very prudently observed, that such a case was not likely to do credit to his or any other operation; but that he would examine the bladder, to ascertain the character of the stone and condition of the parts.

The patient having placed himself on a bed (admirably constructed), the feet were put into slippers placed on two projecting slides, and at such a distance as to give a moderate elevation and separation to the thighs and knees; and this alone is necessary—neither ligatures or the mechanical interference of assistants being required—the patient is simply enjoined to be passive. It has already been observed, that the immediate and violent contraction of the bladder in this examination, barely permitted time for the detection of a small stone. On the second occasion, however, a few days subsequently, the water was injected more cautiously and slowly, to obviate if possible that alarm and re-action which had occurred on the former occasion: about ten ounces of fluid were thus passed, and an opportunity afforded of finding a small stone; and also of ascertaining that the *colonnes de la vessie* were considerably enlarged, and the organ itself much contracted. The three-branched instrument was then introduced, rather for the purpose of shewing the mode of doing it, than with the intent of performing an operation. In a few seconds, however, the stone was caught; and on

the patient being told that such was the case, he exclaimed, then "pray do not let it escape." The instrument was fixed in a vice-formed moveable bar at the foot of the bed, and in a few seconds pulverised and broken to fragments. It is worthy of remark, that the patient himself observed, that since the bladder was first injected he had experienced less irritation, which he attributed entirely to that circumstance, and which was mainly conducive of the comparative quietude of that organ on this occasion. No febrile or other disturbance was excited, and he was simply directed to keep quiet, and dilute largely with mucilaginous drinks. For the other details the reader is referred to the beginning of the case.

In addition I merely beg to add that, considering the unfavourable state of this patient for an operation, and its fortunate result, the adopting of this process in England is likely, in all early cases more especially, to supersede the necessity of the knife. My medical friends, with myself, are anxious to bear testimony of the great tact, judgment, and proper confidence which the Baron exhibited through the whole process; and do not hesitate, with myself, to think that a most important æra in surgery is about to be established by this modification of so important an operation.

I am, Sir,

Your obedient servant,

ANTHONY WHITE.

Parliament-Street, Sept. 2, 1829.

COMPARATIVE CLAIMS OF BARON HEURTELOUP AND M. CIVIALE.

To the Editor of the London Medical Gazette.

SIR,

IN the Medical Gazette of August 8th a letter was inserted, signed "W. B. Costello," containing observations on Baron Heurteloup's instruments; and, in a note added to it, you expressed your opinion, that by operation alone could the comparative merits of M. Civiale's and M. Heurteloup's instruments be decided.

A trial has been made; M. Heurteloup has operated with complete success; Mr. Costello has made several attempts to operate in two cases, and

failed in each. This is sufficiently conclusive as far as it goes; yet, in summing up a history of the lithontritic process, in the leading article of August 29th, you decide the question unequivocally in favour of M. Civiale*, and give to him all the honour of an invention which he has only had the merit of copying. I fear Mr. Costello's letter has misled you, and, as it may also have deceived some of your readers, I must beg you to allow me to point out some of the mistakes with which it abounds.

Your correspondent prefaces his remarks by saying, that had the description of the Baron's instruments (published in your journal of July 25th) appeared in Paris, no answer would have been required, as the question there had already been decided. This assertion is perfectly correct: *the question has been decided* in favour of M. Heurteloup. And to prove this, it is only necessary to refer to the official reports of the proceedings of the Académie Royale des Sciences, for the years 1826-27. As Mr. Costello does not seem to be aware of these documents, and they may not be in the hands of all your readers, I subjoin some of the passages which bear upon this fact.

In the "Programme of Prizes awarded by the Royal Academy in its public sitting of Monday, June 5th, 1826," are the following paragraphs:—

"To Dr. Civiale, who has published several important memoirs on Lithontrity, or the means of crushing calculi in the bladder, and who has successfully operated on the greatest number of patients, a sum of 6000 francs.

"A sum of 2000 francs to each of the three physicians whose names follow in alphabetical order:—

"To M. Amussat, author of a very remarkable memoir on the Urethra.

"To M. Heurteloup, author of a memoir on the Extraction of Calculi by the Urethra, and who has *very ingeniously improved* the instruments adapted to this operation.

"To M. J. Leroy (d'Etoilles), who published, in 1825, a work on the same subject, and who **THE FIRST**, in 1822, made known the instruments he invented for this operation, and which he has since endeavoured to improve."

* We undoubtedly hold the invention of M. Civiale's instruments to have preceded that of the Baron's; but, from a letter in our last Number, it appears that Mr. Elderton anticipated all the French surgeons.—ED. GAZ.

Again, in the Programme of the Academy for June 1828:—

“The Academy, wishing to second with all its power, improvements in the new operation, by means of which the stone is crushed in the bladder, has awarded a prize of *five thousand francs* to M. le Baron HEURTELOUP, for the important improvements and ingenious instruments which he has this year introduced in lithontrity, by means of which this operation is more quickly and certainly effected, is rendered less painful, and consequently more exempt from the serious accidents which have sometimes accompanied or followed the operation.”

Here, then, it is proved, that the question is decided in Paris, since the commission, appointed by the Academy, and formed of the most distinguished members of the profession, have awarded to M. Heurteloup first *two thousand*, and afterwards *five thousand francs*, “for his important improvements and ingenious instruments,” which, they declare, have much diminished the length and danger of the operation. Yet would your correspondent persuade you, that M. Heurteloup’s “important improvements” are all useless, and “the ingenious instruments he has invented,” imperfect copies of bad originals!

In the same Programme which I have quoted, is a paragraph deciding the question between M. Leroy (d’Etoilles) and Dr. Civiale; since the sum of 2000 francs is awarded to the former, as having “THE FIRST made known, in 1822, the instruments he invented for this operation.”

As on this question depends the degree of merit appertaining to Dr. Civiale, I must beg to be allowed to dwell for a few moments on the leading points. Dr. Civiale says he had proposed this manner of operating in 1818, and his proposal was laid before the Faculté de Médecine, who nominated MM. Chausier and Percy to report upon it; and that he shewed M. Marjolin instruments for that purpose. Both the gentlemen forming the commission assured M. Leroy on his inquiring, that Dr. Civiale’s paper only related to the inclosing the stone in a pocket, and then acting upon it by chemical agents. M. Marjolin also affirmed he had never been shewn any instrument by Dr. Civiale, except for that purpose.

M. Percy, however, at a late period, said he had, on more careful examination, found a proposal for the crushing of stones in Dr. Civiale’s paper. It must appear extraordinary to every one, that he should refer several times to a paper, containing only four pages, and read it before M. Leroy, with reference to this fact, yet not see the most important article in it, had it been there in the first instance. On this imperfect evidence Dr. Civiale claims the honour of being the original inventor.

But allowing that Dr. Civiale had, as he says, proposed an instrument of the kind, it is quite evident, as even the commissioners had not seen it, that M. Leroy could not have copied from that; nor was it until after he had published his work and instruments, and presented them to the Academy, that Dr. Civiale opposed his claims, publishing himself an instrument so faulty in its construction, that it required but little examination to shew that it could not answer the purpose proposed, and that the attempt could not be made without danger to the life of the patient. A year past, M. Leroy had much improved upon his original design, but still deferred operating, in the honourable desire of making his instruments more perfect; when it was announced that Dr. Civiale had operated, and succeeded in breaking a stone. But with what instrument did he operate? with such a one as he had described? He never could, and never did, operate with that: the one he used was precisely similar to Leroy’s improved one, the head of the drill only being rather larger!

We now, then, come to the true state of the question. Neither M. Leroy nor Dr. Civiale have the merit of having first proposed this mode of operation, for Gunthmisen, in 1813, demonstrated publicly the possibility of passing a straight sound of large diameter, and also proposed instruments similar in purpose to those of Leroy’s and Civiale’s, though far inferior in construction. Further, Dr. Civiale was not even the first who by means of instruments broke up stones in the bladder, for there are two instances on record of persons having thus operated on themselves. The first was a monk of Cîteaux, who invented an instrument by which he broke up the stone. The second is recorded in the Journal of the Royal Institution of

Bombay, of Col. Martin, who, by an instrument of his own invention, filed a stone in his bladder into powder.

Dr. Civiale's claims to our admiration are thus reduced to a very moderate standard. He has the merit of having been the first in modern days who successfully performed the operation of grinding the stone in the human bladder, by an instrument invented by Leroy, and slightly modified by himself, and of publishing it to the world. On this ground he might justly elaim our gratitude, and we have to regret, that, not satisfied with that which he really deserves, he should tarnish his merit in the endeavour to raise himself higher, by calumniating the labours of others equally earnestly engaged in an honourable pursuit; more especially of M. Leroy, from whom he copied the instrument by which he has himself risen to fame. It is by such lamentable jealousies that a profession, which, in its objects, yields to none in high claims to respect, is degraded to the lowest rank of learned professions. And it is by such unworthy efforts that an operation which promises to prove a blessing to mankind, is in danger of being stopped in its progress, or entirely thrown into disrepute.

After the decision of the Academy, it may seareely seem necessary to enter further into the details of Mr. Costello's letter; it may, however, be of service to those who wish to satisfy themselves on the comparative merit of the instruments now employed in lithontrity, to show how futile are the objections raised against those which the Academy have decided to be the most perfect.

To form an accurate opinion, it has generally been considered necessary to either examine an instrument, or, at least, correct plans of it; M. Civiale and Mr. Costello, however, apparently think differently, for, not only have they judged and condemned the instruments of the Baron Heurteloup without having seen them, but further, without having even seen a description or plan of them, for no plans whatever have been published, and there is only a general mention of them in the Report of the Academy. How, then, have they acquired a knowledge of their merits and demerits so perfectly as to justify them in their sweeping censures? By hearsay alone? They have had no other means, and

from this fact we may estimate the value and importance of their objections and strictures.

Mr. Costello, after asserting that four or five perforations would be sufficient to enable the pressure of the pincers and perforator to crush a stone of middling size, asks what degree of pressure of the three-branch instrument would the stone bear which the Baron shews with *fifteen perforations*, if even a fifth of the above number had been made. I am convinced it will bear so much with *the fifteen as it now is* that no three-branch instrument Mr. Costello possesses will break it, and if he doubts this, and feels inclined to try publicly, I am sure M. Heurteloup will allow him.

It has been already shewn in your No. of August 22d, by a correspondent, the unfortunate mistakes Mr. Costello has made in his attempt to distinguish the different instruments, by which means he quotes a long list of objections from Dr. Civiale against the "*pince à trois branches avec le perforateur à virgule*," mistaking that instrument for the "*evideur*," for which Dr. Civiale's observations were originally intended, shewing clearly, as I have already said, that he had never seen either, and was totally unacquainted with the construction of both.

With respect to Dr. Civiale's objections to the "*evideur*," as quoted by Mr. Costello, a very few words will answer each. In saying that it cannot be applied to more than one-eighth of the number of calculous patients, he asserts that which he has failed to prove; but, even allowing it to be true, Dr. Heurteloup then can destroy one-eighth of the number of calculi in a more perfect manner than they have been before. He says, in order that a stone may be scooped out with it, the calculus must be spherieal. This is proved by actual experience not to be the case. Again: "the weakness of the virgule requires that the stone should be soft:" so far from the virgule being weak, or in danger of breaking, I have, with the Baron's permission, endeavoured to break it with my fingers, using a force far greater than it could ever be required to bear: it is, in fact, so strong, that I am convinced had Dr. Civiale seen it, he never would have made the assertion. "It is necessary

to attack the calculus precisely in the centre:" this is not the case, and it only requires a moment's examination of the instrument to be convinced of it: no doubt the centre is the most favourable point to commence, but it does not therefore follow that it is the only one. He says this process is one of the slowest. Dr. Civiale is again mistaken: such is not the fact; and his complaint that the different parts of the instruments of M. Heurteloup have a special destination, and therefore cannot adapt themselves to the different circumstances that may arise, is equally unfounded in truth. It has been proved in a most successful practice and in public, that they adapt themselves very perfectly to the exigencies of the cases.

Mr. Costello again objects to that part of your correspondent's description which says, that the three-branch instrument cannot seize a stone of 18 lines in diameter, and concludes that M. Heurteloup has no instrument capable of seizing a calculus measuring from 20 to 25 lines in diameter, adding that M. Civiale's three-branch instrument seizes such calculi with facility.

What your correspondent before asserted I now repeat with a little modification. For the three-branch instrument to seize a stone of large dimensions, the branches must be so far elongated and separated that, in making the necessary movement to seize the stone, there is very great danger of catching with the upper branch a portion of the lining membrane of the bladder, without the operator being conscious of it, and consequently of pinching it with the stone; and this, I have little doubt, may account for many of Dr. Civiale's unfortunate cases. Again: Mr. Costello boasts of Dr. Civiale's instrument being able to take a calculus of 25 lines in diameter: but before a stone attains that size, in what state must the bladder be? and has M. Civiale ever attempted to operate with such a stone in the bladder, or would he? if not, his instrument gains little in value by being capable in doing more than it ought ever to be required.

"M. Civiale," says your correspondent, "has satisfactorily proved the impossibility of terminating an operation at a single sitting by the *brise coque*." M. Civiale cannot have proved, whatever may be his abilities, the im-

possibility of that which has been done. M. Heurteloup has done this operation in public.

Mr. Costello further charges M. Heurteloup with merely having copied M. Civiale's *brise pierre*. This is not correct; and, as a proof of it, M. Civiale cannot produce an instrument similar to the Baron's. Besides, had it been merely a copy of one already submitted to the Academy, would they have rewarded him for it? He cites *seven* of these instruments in existence before M. Heurteloup's, to prove how unnecessary it was; but if there were seven before, including M. Civiale's, it only shows that there was not one that answered the purpose, since another was required and rewarded.

Mr. Costello adds, M. Civiale laid aside his, from the difficulty he had in using it, and the risk he ran of pinching the bladder, and further, concludes with much apparent satisfaction, by determining its value to be merely that of an object of *vertu*.

If M. Civiale laid aside his from the difficulty he had in using it, or the risk he ran of injuring the bladder, that can only prove one of two things; either that his instrument was not well adapted, or that he was awkward in using it, neither of which can form any argument against M. Heurteloup's *brise coque*, since with it he seizes small calculi or fragments with great ease, and has never injured the bladder, and a slight examination will prove that he is in no way liable to do so. He has performed three public operations, besides private ones, with his instrument, and all have been successful, which proves, that if it be merely an object of *vertu* in Mr. Costello's hands, it is a very useful instrument in those of Baron Heurteloup.

I have thus, sir, in glancing on the most glaring errors of Mr. Costello's letter, I think fully shewn how incompetent gentlemen must be to describe instruments who have never examined or even seen them, and how much easier it is to censure than to appreciate. I have entered fully into this discussion now, that I may not be obliged to return to the disagreeable task. I have said that neither M. Civiale nor Mr. Costello know any thing about Baron Heurteloup's instruments: if this be correct, they cannot be competent to

pass an opinion upon them, and, therefore, I shall not think it necessary to answer any observations that may be made in reply. If I am wrong, I offer Mr. Costello an opportunity of proving it, by coming any Saturday within the next month to the Westminster Hospital (giving me previous notice), and shewing that he knows the instruments by publicly demonstrating them: the instruments are confided to my care, and I shall be happy to place them before him. If I have wronged him, I will hasten as publicly to render him justice.

I trust, Sir, by laying these observations before your readers, it will enable them to render honour where honour is due; and at the same time that they do full justice to the meritorious exertions of Dr. Civiale, to perfect the science of lithontrity, not to allow the effects of a jealousy, which is much to be regretted, to diminish the credit due to M. Leroy, who, as the fruit of much labour, first published an instrument capable of being used in the bladder of a patient:—nor of Baron Heurteloup, who, by years of talented exertions, has so far improved the science by his ingenious instruments as to diminish, in a most important degree, the danger and pain of using them, and rendered them applicable to a much greater number of cases.

I hope also that this means of relieving the patient, at apparently so little danger, of one of the most perilous diseases with which we are afflicted, will have a fair and complete trial in England, as it has already had in France. I must, therefore, regret, that since M. Civiale has judged proper to have his claims transferred here, that for the interest of science, he should not have come in person, rather than have entrusted the success of so important a process to another. Baron Heurteloup has operated on *forty-three* patients, *forty* of which have been successful; the other three he did not go on with from causes unconnected with the operation. This, it will be remembered, is a success far beyond what Dr. Civiale himself has gained, for, in his first *eighty-two* operations, only *forty* succeeded.

I am sorry, Sir, to have trespassed so long upon your attention, but the importance of the subject, I think, fully warrants it; for, it is not merely the question of priority of invention, or

whether Baron Heurteloup's or Dr. Civiale's instruments are the most perfect, but it involves one of still greater moment,—the success or failure of a mode of operation promising an immense saving of human life and suffering. For, if with Baron Heurteloup's instruments only *three* operations fail out of *forty*, allowing the most unfavourable construction, and with Dr. Civiale's *forty-two* out of *eighty*, it necessarily follows that on these facts, and their causes being fully known and appreciated, depends the estimation in which the operation will be held—an operation which has been justly termed the greatest improvement of modern surgery. And if in my endeavour to advance the cause of science, I have been obliged to enter into a discussion involving individual interests and feelings, I can only regret that the petty jealousies and imperfections which are so often unfortunately mixed with man's best efforts, should have left me no choice.—I am, Sir,

Your obedient servant,
J. RUTHERFORD ALCOCK,
House-Surgeon.

Westminster Hospital, Sept. 6th, 1829.

ANALYSES & NOTICES OF BOOKS.

“ L'Auteur se tue à alonger ce que le lecteur se tue à abrégér.”—D'ALEMBERT.

The Influence of Climate in the Prevention and Cure of Chronic Diseases, more particularly of the Chest and Digestive Organs, &c. &c. By JAMES CLARK, M.D. Member of the Royal College of Physicians of London, &c.

[Concluded from p. 439.]

DISEASES OF ROME.

IN our former article on this interesting work, we laid before our readers a sketch of Dr. Clark's description of the climate of different parts of England, France, and Italy: we resume our analysis with the diseases of Rome. All the world has heard of the malaria of the Pontine marshes, and not a traveller has returned from the “imperial city,” during the last fifteen years who has not descanted upon its perils. Among the

unscientific there has been a general idea that there was something more than usually pestiferous in the effluvium to which the term "malaria" was applied *par excellence*; but there is, in reality, no foundation for this opinion, because, though the fevers generated by these marshes are more severe than the agues of Holland, or of the fenny counties of England, this depends upon the greater heat of the climate; a circumstance which generally aggravates intermittent and remittent fevers. Some of the Italian writers, indeed, doubt, or altogether deny, the existence of the malaria, and charge the diseases usually attributed to it to the score of sudden changes of temperature, humidity of atmosphere, and irregularities in living. It is remarkable, with regard to strangers, that they are rarely attacked with fever during the first year of their residence at Rome, as if it were necessary for the system to have been exposed during a certain period to the depressing effects of the poison before it is liable to have an actual attack of fever brought on by it. At Rome, the disease seldom appears before July, and usually ceases about October. There are but few strangers who reside there during this period, and the mere traveller, passing through, has little or no cause to apprehend an attack, at least if he be at all prudent in avoiding the immediate exciting causes. Among these, exposure to currents of cold air, when the body is heated by exercise, is one of the most frequent. Another exciting cause is to be found in improper diet.

"An idea prevails (says our author) that full living, and a liberal allowance of wine, are necessary to preserve the health in situations subject to malaria. This is an erroneous opinion, and I have known many persons suffer in Italy from acting on it. A deranged state of the digestive organs is generally the consequence of this regimen; and, under such circumstances, the individual is much more liable to disease of every kind. Irregularities in diet are among the most frequent exciting causes of this disease, among the peasantry about Rome, who are the principal sufferers from it; and I may add, that whether the stomach is disordered by excess in wine and animal food, or excess in vegetable food, it is of little conse-

quence. A plain and moderate diet, as it is the most conducive to health generally, so it must, in the present case, best assist the constitution to resist the cause of this fever. If there is any one circumstance in the state of the constitution which more than another enables it to resist disease, and to pass through disease safely when it does make its attack, it is, according to my observation, a healthy condition of the digestive organs. In every situation of life, and in every climate, this holds true."

We have no doubt of the truth of this position, but it is to be kept in mind that the nature of the diet, as to the proportions of animal food and wine, which will agree with any one, and preserve a "healthy condition of the digestive organs," will differ much in different situations. The late Dr. Gregory, of Edinburgh, used to mention in his lectures, that he was one of twelve students who went one season from this country to attend the classes at Leyden. Wine was cheap and good, and the youths took their bottle of claret every day *on principle*; all save one, and he, out of the dozen, was the only man who became affected with ague. This story is in keeping with a remark made by our author, who observes incidentally, that the chilly atmosphere of Holland may require a stimulating regimen, such as could not be borne in the exciting climate of Italy. It has been frequently asserted of late that the influence of malaria at Rome is rapidly increasing: Dr. Clark does not believe this, and, on the contrary, states, as the result of his experience, that fevers were much less prevalent during the last four years of his residence in that city than they had been for some time previously. Much depends upon the dryness or humidity of the season; a wet summer soon fills the hospitals. When an individual is attacked with this fever, it is imperatively necessary that he should remain confined to the house till he be cured; after which, the sooner he goes into another atmosphere the better. In winter, or autumn, he may go to Naples; but if the spring be far advanced, to Florence.

A very curious peculiarity among the inhabitants of Rome is their great sensibility to odours; to so great an extent, indeed, does this proceed, that

it appears to be a fruitful source of nervous diseases.

“ The next circumstance connected with the diseases of Rome which deserves notice, is the peculiar sensibility of the nervous system of its inhabitants. This is evinced, in a very particular manner, by the disposition to convulsive affections, and the singular sensitiveness of the Romans, especially the females, to perfumes. This peculiar susceptibility of the nervous system appears to be of recent origin. We learn from ancient authors, that the Roman matrons were fond of perfumes; and as this peculiarity is not mentioned by the Roman medical authors who have more recently written on the climate and diseases of Rome—for instance Petronio, Baglivi, Marsilio Cagnato, and Lancisi—there can be little doubt that it did not exist in their time. ‘ But in our times,’ says a modern Roman writer, ‘ nervous affections, vulgarly termed *tirature* or convulsions, are extremely common, attacking females more particularly, but likewise delicate individuals of the other sex. So easily affected are such persons, that they cannot even bear the odour of the most pleasant flowers without suffering.’ In reference to the modern growth of this singular sensibility of nerves, the same author adds—‘ This was certainly not the case with the ancient inhabitants, as they were accustomed to make use of very strong perfumes without inconvenience; nay, even in the beginning of the eighteenth century, much more in the age of Petronius, no such evils were dreaded, as no notice of the kind is found in authors; and we know, moreover, that physicians were then accustomed to introduce into the chambers of invalids of both sexes, with the view of purifying the air, the odours of flowers, plants, and resins.’ It is to be remarked that it is not disagreeable odours which produce such effects on the nervous system, but the more delicate and, to northern nations, agreeable odours of flowers, also vegetable and other perfumes. Hysteric head-aches, and numerous nervous affections, are produced by such odours. As remarked by the author just quoted, this influence is chiefly felt by the females, though the males are not insensible to it.

“ The Roman physicians, who agree in the recent growth of this morbidly

sensitive state of the nervous system among the inhabitants of Rome, cannot fix upon any other circumstance to which it can be fairly attributed, except the indolent manner of life of the Romans, which favours, especially in such a climate, the relaxation and sensibility of the system. Thus Dr. De Matthaeis, after remarking that powerful odours have at all times produced sensible effects on the system, observes, that ‘ there is nothing wonderful in this, if we consider the daily increasing mobility of the nervous system, produced by the luxurious and inactive life of our Romans.’ Such was most likely the principal source of this idiosyncrasy, and this no doubt still tends to maintain it; while the morbid sensibility of the nervous system once acquired, is, doubtless, in some degree, transmitted from parent to child. But though much may depend on the effeminate and indolent manner of living at Rome, the climate, I believe, has some specific effect in inducing this state of the nervous system. The habits of the Romans differ little, I think, from those of the inhabitants of the other large towns in Italy—for instance, Naples, Florence, Genoa, &c.; and yet this morbidly sensitive state of the nervous system does not exist by any means in the same degree in these places. Even a temporary residence of some duration at Rome produces a degree of the same morbid sensibility, and in cases where the Roman mode of living cannot be adduced as the cause. Something depends also, I believe, upon the moral education; though it must not be forgotten, that the sensibility of the nervous system in all warm climates is naturally more exalted than in the colder, and the influence of the passions far greater in producing and modifying bodily disease. This is particularly the case with the Romans; and, in tracing the causes of the chronic diseases of such of them as came within my observation, I was struck with the general reference of their origin to violent mental emotions.”

Inflammatory affections of the chest are very common in Rome, and run a more rapid and violent course than in more northern countries; a remark which applies to Italy generally. Pure tubercular consumption is not very common at Rome: an eminent physician of that city stated the proportion

of deaths from it as one in fifty. Dr. Clark thinks this greatly under the mark, but still he looks upon this as one of the diseases decidedly benefited by the climate of the place.

“ I have frequently known patients (says he) who had left England labouring under symptoms that gave much and just alarm (such as cough, expectoration, &c.), which continued during the whole journey, and entirely disappeared after a short residence in Rome. The same persons have remained comparatively free from all bad symptoms during the whole season; and this when, from the ultimate result of the case, there could be little or no doubt of the existence of tubercles in the lungs at the time. In the advanced periods of consumption, I cannot say that the climate proved of any benefit, the disease generally proceeding in the usual course, and perhaps even more rapidly (especially during the spring months) than it would have done in England. In some cases the disease was increased in a remarkable manner during the journey to Italy.”

But it is in bronchial affections, above all others, that our author has found the climate of Rome beneficial; and, where the disease is of “ the dry, irritable kind,” he is satisfied that it is the best situation on the continent.

Rome has a great advantage over all the other continental towns visited by our author, in the number and variety of its public walks and rides: a great recommendation to invalids. The Piazza di Spagna, and streets in its vicinity, afford the best residences. There is one caution strongly expressed by Dr. Clark, and which merits the attention of all practitioners who may be consulted by patients going to Rome: it is the absolute necessity of resisting the numerous temptations presented, especially to persons of taste, to destroy all the benefit of the climate, by spending too much time in “ the cold churches, and still colder museums,” of the Vatican and the Capitol. “ If (says our author) his visits to these be long, or frequently repeated, he had better have remained in his own country.”

Invalids who have gone to Italy for the mildness of its winter, generally quit it during the summer, to avoid the oppressive heat. For this purpose, most persons recross the Alps, and this ought to be done before the end of June. All

consumptive patients ought to adopt this course, as they generally, in all stages of the disease, suffer much from the heat of an Italian summer. To those, however, who, from the nature of their complaints, or the inconvenience of a long journey, remain on the south side of the Alps, Naples, Sienna, and the Baths of Lucca, are the most eligible situations. The latter, especially, presents several great advantages, as the mean temperature of the summer is only six degrees above that of London; the evenings are cool, *and there are no mosquitoes.*

CLIMATE OF SWITZERLAND.

Much caution is required by consumptive patients as regards their summer residence. Switzerland is conveniently situated, and is generally resorted to; but the alternations of temperature, in most parts of it, are both rapid and extensive. Invalids who pass the summer in that country, ought, therefore, to be extremely careful not to join in those enticing mountain excursions which their robust friends generally so much delight in; and, in fact, they can never, with safety, for a moment lose sight of the great object of their going abroad—namely, health. The borders of the Lake of Geneva afford, upon the whole, the best situations, and the neighbourhood of Geneva itself is perhaps the least exceptionable. Our author thinks highly of the effects of ripe grapes, to the extent of several pounds a-day, with abstinence from wine, “ in irritation of the mucous membrane of the lungs and digestive organs, and in congestive states of the abdominal viscera, with disposition to hemorrhoids.” Some dyspeptic and hypochondriacal patients spend the summer to great advantage in Switzerland, while others profit more by a course of the mineral waters of Plombieres, Vichi, Ems, or Carlsbad.

CLIMATE OF MADEIRA.

The climate of Madeira has long been held in high estimation. The mean annual temperature of Funchal, the capital, is 64 degrees; a very moderate degree of heat. But the excellence of the climate depends on the mode in which the temperature is equalized; for while the winter is 20 degrees warmer than that of London, the summer is only 7 degrees hotter; and while the

winter is 12 degrees warmer than that of Italy, or Provence, the summer is actually cooler by about 5 degrees. The steadiness of temperature from day to day is not less striking: it is not nearly so variable as Rome, Nice, Pisa, or Naples.

"When we take into consideration the high temperature of the winter, and the mildness of the summer, together with the remarkable equality of the temperature during the day and night, as well as throughout the year, we may safely conclude that the climate of Madeira is the finest in the northern hemisphere.

"The salubrity of this favoured island also—its exemption from all endemic diseases, and the general mildness of the ordinary complaints from which no climate nor situation is exempt—contribute to render Madeira a very desirable residence for those invalids in whom benefit may be expected from a mild and equable climate.

"There is no place on the continent of Europe with which I am acquainted, where the pulmonary invalid could reside with so much advantage during the whole year as in Madeira. On this subject I have already cited Dr. Heineken's opinion, which is of the greater weight, as he himself resides in Madeira in consequence of a pulmonary complaint. He has found that he rather retrograded during the winter, but always gained ground during the summer. 'Could I enjoy for a few years,' he observes, 'a perpetual Madeira summer, I should confidently anticipate the most beneficial effects.' So strong, indeed, is his opinion of the summer climate of Madeira, that he recommends pulmonary invalids, who can conveniently accomplish such a plan, to pass the winter in the West Indies, and the summer at Madeira.

"The mildness of the summer at Madeira is a very fortunate circumstance for those invalids who require to pass several winters abroad (which by far the greater number of consumptive patients should do), and for whom it is very difficult to find a good situation during the summer on the continent, even after a long and often tiresome journey. When it becomes requisite for a whole family to remove to a mild climate, this is a consideration of much weight, more especially when the members of such a family are chiefly females.

In Madeira, the invalid has only to change his winter quarters from Funchal to a more elevated situation in the neighbouring country. He is thus saved a voyage or journey, and, if he is prudent, he will often find that he has gained more in health during the summer than he did in the winter. 'As a permanent abode,' says Dr. Heineken, in a written communication to me, 'I believe Madeira surpasses every other, because it contains within itself the means of equalizing the annual temperature more completely than any other spot with which we are acquainted. The *lowest* to which a thermometer exposed all night in a north aspect has ever fallen in Funchal during five years, is 50°; and the *highest* to which it will ever rise, at such a distance up the mountains as would in every respect suit an invalid, need never exceed 74°. The sirocco visits us so seldom, and its heat may so readily be avoided by closing the doors and windows, that it need not be taken into account. The mean annual diurnal range is from 8° to 10°, that is, from the extreme of heat to the lowest degree of cold; but an invalid may, with a little common-place precaution, and without the aid of fires, live in a temperature never varying more than perhaps 6° throughout the twenty-four hours within doors. In a few words I would say, there is no occasion for a person, throughout the winter in Funchal, to breathe, night nor day, within doors, an atmosphere below the temperature of 64°; or in the country, and at such a height as to insure dryness, above that of 74°; that he may during the summer take abundance of exercise, by choosing his hours, without ever exposing himself to oppressive heats; and that in the winter he need not be confined to the house the whole day, either by wet or cold, more perhaps than a score of times.'

"The foregoing evidence is quite sufficient, I think, to show that where climate is likely to be useful in consumption, that of Madeira is preferable to any in the south of Europe; and it has this important advantage over all other places frequented by invalids, as I have already remarked, that they may remain there during the whole year without being subjected to the inconvenience of a long journey, or suffering from oppressive heat."

Excellent, however, as the climate of

Madeira unquestionably is, nothing can be more perfectly absurd than the practice, not unfrequently adopted, of sending patients, in the advanced stage of consumption, to die there—deprived of many of the comforts to which they have been accustomed, and at a distance from their friends. So uniform (says Dr. Renton)* is the result of this practice, that the annual importation of invalids from England is thought a fit subject for ridicule among the boatmen, on landing these unfortunates on the island. *La vai mais hum Inglez a Laranjeira*: “there goes another Englishman to the Orange-Tree” (the burial ground of the Protestants).

Our author, in the second part of his work, proceeds to speak of the individual diseases benefited by climate; but on these we cannot enter. We can confidently refer those who wish for farther information, to the work before us, in which there is much important statistical and general information, conveyed in a very unassuming manner.

MEDICAL GAZETTE.

Saturday, Sept. 12, 1829.

“*Licet omnibus, licet etiam mihi, dignitatem Artibus Medicæ tueri; potestas modo veniendi in publicum sit, dicendi periculum non recuso.*”—CICERO.

ATTACKS ON *PRIVATE* CHARACTER AND *PUBLIC* INSTITUTIONS.

“THEY seconded our exertions by an almost endless out-pouring of venomous attacks against private character.” Such are the words applied to the conductors of the Gazette by a weekly contemporary, whose delinquencies they have so effectually exposed as to shake to the very centre the popularity of a Journal which, in the pride of his heart, the Editor declared to be “immutably established.” The state, indeed, to which the publication alluded to is now reduced, might well spare us the trouble of inflicting farther castigation, did not the attacks on individual character, which occasionally escape the Editor in the bitterness of his disappointment, oblige us from time to time to remind

him that the rod is only laid aside during good behaviour, and that on *his* docility alone depends the continuance of *our* forbearance. His Journal has long been too contemptible to require frequent notice at our hands; because it is scouted by the profession, and, therefore, can no longer injure that profession as a body. The Lancet, indeed, is now so well appreciated in the metropolis—its town circulation is so happily adjusted to its literary and scientific merits—that it has become a work of superelevation, so far as London readers are concerned, to point out its measureless falsehood, or to ridicule its noisy declamation, which all here have learned to regard as “full of sound and fury, signifying nothing.” These, indeed, were the characters of the Journal in the days of its prosperity, and they mark no less the period of its waning fortunes; but there is this mighty difference between the Lancet in the plenitude of its success, and the Lancet in its present dwindled condition—that those members of the profession who suffered themselves to be led away by the hope of sharing in its ill-gotten popularity, have become sensible of their lamentable indiscretion, and, by withdrawing their assistance, have left the vulgar mind of the Editor to display its loathsome workings, unrelieved by a ray of genius—unredeemed by one particle of professional information. Even Dr. Blundell, whose lectures have figured in the Lancet for two years (some of them *da capo*—that they might last the longer), has at length concluded, unable to spin the thread of his discourse through another page. Even Dr. Blundell, we say, has retired; but he has done enough to make his name be long remembered as that of the last man with any character to lose who assisted to uphold a work which set all morality at defiance,—which disgraced the profession to which he belonged—which traduced his

* Edin. Med. and Surgical Journal, vol. xxvii.

brethren—and, along with his lectures, published against one of his immediate colleagues at the school of Guy's Hospital as malignant a libel as ever issued from the press.

But to return—the constant cry of the Editor of the *Lancet* is, that we attack his private character. The truth of this asseveration depends entirely on whether his *private* character be represented by his *public* acts. By these, and by these alone, have we been guided in our remarks—to these alone have we alluded in the pages of this Journal.

If the objects of a publication consisted in the discussion of general subjects, whether of literature or science, the character of its Editor would be of little moment to the world; but when he attacks individuals—charges them with want of truth, with want of knowledge, and with want of honesty—it then becomes of vital importance to know the claims which the writer himself has to these qualifications. The degree of credit given to an accusation of falsehood is not a little diminished if it be found that he by whom it is adduced is proverbial for mendacity; and the importance attached to the denunciation of a professional blunder is somewhat lowered if it appear that the denouncer lacks the knowledge which would qualify him to judge.

On this principle we take leave to investigate the qualifications of the Editor of the *Lancet* to become a public critic; we examine into his education and his opportunities; we inquire into what *he* has ever done in his profession, who so freely censures the doings of others? These things the Editor of the *Lancet* may perhaps call private; and not without justice, for some of them are so private that he has contrived to conceal them altogether. Nay, farther, when charges of the most appalling nature are brought forward against respectable men, we naturally inquire into the cha-

racter of their accuser; we endeavour to ascertain whether he has been known to the world as a man strictly regardful of the truth—free from malice—guided by disinterested motives. All this is in the common course of justice. There is, indeed, no more satisfactory mode of repelling a false accusation than by shewing the utter worthlessness and incredibility of the witness. Nay, it is what the Editor of the *Lancet* has himself *attempted* to do. Alluding to exertions which he falsely says were made by us to destroy the reputation of a man whom we will not insult by introducing his name along with Wakley's, this worthy says, "*but their own CHARACTERS are a sufficient antidote to their base designs.*" Now this mode of appealing to character, which he himself suggests, we have found to be the readiest means of rebutting "the base designs" of the Editor of the *Lancet*, and we shall continue to adopt it as often as occasion requires. As we have just said, he has himself attempted the same thing; but there is this mighty difference between his attempt and ours—that his has totally failed, and ours been pre-eminently successful. We are not wont "to deal damnation through the land," and therefore we do not provoke the same kind of retaliation—from any quarter save one; but if we did, our character, thank heaven! stands on somewhat different grounds. There are many false accusations against which direct proof could not be brought, except in a Court of Justice—perhaps not even there: but this is now of little moment, for what regard would any reasonable man have for the assertions of a Journalist who has been three times east for libel, and whom we have demonstrated, over and over again, by the incontrovertible evidence of quotations from his own pages, to be utterly regardless of the truth.

Often, however, as we have admired the *Lancet's* proficiency in this leading

branch of ethics, one of its recent articles exhibits its regard to consistency and truth in a more striking aspect than any in which we have yet contemplated it. The great principle which the Editor seems to have adopted, is the infinite *gullibility* of his readers: grant but this fulcrum, and the whole mechanism of imposition becomes easy. He may assert one week what he denies the next, and still maintain a character among his country readers for undeviating con-

sistency. We really doubt, however, if there be any, even of those innocent souls who look upon the Editor of the *Lancet* as a second Daniel, come to judge "the tools of corruption," but will have their faith in the "immutability" of his sentiments regarding our public institutions a little staggered when they compare the doctrines of the *Lancet* for June 27th with those of the same *Lancet* for August 29th:—

LEADER—*LANCET*, JUNE 27.

"Hospitals, Infirmaries, and Dispensaries, have often been denominated human slaughter-houses in the pages of this Journal. Repeatedly have we urged the impolicy of supporting these institutions—repeatedly have we exposed the proceedings of the quacks by whom many of them have been founded, and repeatedly have we described the scenes of blood which are frequently exhibited within their walls. The public are in no instance more decidedly deluded than in entertaining the supposition that Hospitals, Infirmaries, and Dispensaries, furnish the best means of alleviating the sufferings of the diseased poor." * * * In a word, Hospitals, Infirmaries, and Dispensaries, are the puff shops of the physicians and surgeons, and the humane treatment of the poor is altogether out of the question, or is a thing mentioned only to be laughed at."

If the country readers of the *Lancet* should marvel at the pleasing contrariety of tone and sentiment displayed in these quotations, we will explain the mystery—it is the rapidly decreasing reputation of the Journal which has produced the recantation of its respected Editor. He now sees that the public laugh at the idea of a man, utterly unknown in the walks of science, arraigning the acquirements of all the first men in the profession; and he would be ready to fawn at the feet of those whom he has so often calumni-

LEADER—*LANCET*, AUGUST 29.

"With a view to lessen our influence with the profession and the public, it has been asserted, with ten thousand other falsehoods, that we have endeavoured to destroy, and in a great measure have actually injured, our excellent national Hospitals. * * * We have been always too much impressed with a knowledge of the blessings which our Hospitals hold out to a suffering and impoverished people to desire their downfall, or the least diminution of their resources. * * * The assertion, therefore, that we either are or ever have been the enemies of these Hospitals, [alluding to St. Bartholomew's, St. Thomas's, Guy's, St. Luke's, and others,] is false—basely false."

ated, if his abasement would avail him*. He finds that the public are as much disgusted as the profession with his base attacks upon our medical charities, and he would now gladly retract every calumny he has uttered, if he could thereby restore his "immutably established Journal" to its former place. This is the clue to all his anxiety

* No men have been more abused in the *Lancet*, for incompetency, than the Professors of Surgery and Physiology, Practice of Medicine and Materia Medica, in the London University; the three most important chairs: but now he "can speak in terms of *unqualified* praise of the London University, as a medical and surgical school." !!!

and all his tergiversation; but it is too late. His vituperation of medical charities, and his unprincipled attacks upon those connected with them, are looked upon by all as part of a regular system to entrap the public. His narratives of individuals "*butchered*" in the "*human slaughter-houses*," by "*the ignorant, conceited, malignant, lying, insulting, boasting hospital-surgeons of this metropolis*," are not the honest effusions of a benevolent heart bleeding for the sufferings of the poor, but garbled stories procured at second-hand, and dramatized with heartless brutality to make the multitude stare, and promote the sale of his work. As to the welfare of the medical profession, the interests of the public, the cause of charity, or the amelioration of the condition of the poor, who that has watched the origin and progress of the *Lancet* can believe that its views were ever for a moment seriously or honestly directed to the promotion of these objects? It commenced its career by an outrage upon public decency, and subsequently kept alive, by slander, the curiosity it had first excited by its obscenity.

But if his statements with regard to our hospitals have been marked by the grossest misrepresentation, neither is there more truth in his account of other institutions, less known to the public; which fact, as well as our principle of turning from the accusation to the *accuser*, we shall illustrate in another number.

LONDON UNIVERSITY.

SOME changes are rumoured as about to take place in the Medical School, but as the arrangements have not been (so far as we know) definitely made, we decline publishing any statement, which might prove injurious to individuals, particularly as the points at issue may, perhaps, be amicably settled, *with the assistance of the Council*. We understand that there has been some negotiation with the Governors of the Fever Hospital, with a view of connecting that building with the University. The plan appears to us to be absurd. The

Fever Hospital has the same disadvantage as the Middlesex—that of being too distant; while, with any addition that the University could afford to make, it would still be much smaller, and consequently afford a more contracted field of observation for the pupil.

POISONING FROM OPIUM.

A DISTRESSING case of this nature, which took place last week, is mentioned in the different newspapers in the account of an inquest held on the body of the deceased on Monday the 7th inst. The statement which has been published leaves the subject in considerable mystery, and gives an impression very unfavorable to the medical men in attendance. But we feel it our duty to state that the account is in various particulars defective, as the fact of Dr. Tweedie not having prescribed the opium is left to rest on his testimony alone; whereas his prescription, which we subjoin, was produced before the coroner.

The prescription of Thursday is as follows:—

R Submur. Hydr. grs. ij. Ext. Coloc.
Co. gr. viij. Olei. Carier. gtt. ij.
Contunde et fiant pilulæ duæ h. s. s.
R Infus. Cuscar. ℥ij. Infusi. Sennæ, ℥ij.
Mammæ, ℥ss. Tinct. Gentian. Co. ℥j.
Mise.

Sit Mistura, cujus capiat coch. tria. amplater quotidie.

For Mrs. Phillips, 3d Sept. 1829. A. T.

It was sworn by Mr. Hill (Mr. Snow's assistant) that the medicine was made up as ordered; and there is this presumption in favour of his evidence, that the deceased had taken three table-spoonsful of it on Thursday night, and the same quantity twice on Friday; after which she went out, and it was not until the evening that any symptoms referrible to opium were observed.

HOSPITAL REPORTS.

HOTEL DIEU.

Amputation of the Jaw.

A girl, 14 years of age, but whose aspect gave the idea of her not being more than 10, presented the following appearances:—On opening her mouth, and pulling down the lower lip, the incisor teeth were first observed—some carried backwards and others forwards, as regards their natural situation; they were loose, and seemed as if embedded in soft wax. The gums were raised up, and beneath them the parts were perceived to be of a very deep red. Behind, that is to say, on the side of

the jaw next the mouth, the same appearances present themselves. Laterally, the disease appeared to extend beyond the first molar tooth on the right, and as far as that point on the left. When two opposite points of the jaw were laid hold of and pressed in different directions, in the manner usually done to ascertain the existence of fracture, about the symphysis, a very slight degree of mobility was experienced; and this M. Dupuytren stated had frequently fallen under his notice. There was a certain kind of imperfect fluctuation perceptible, which, together with the other symptoms, led M. Dupuytren to the conclusion that the case was one of fungus hæmatodes. He thought it prudent, however, to make an *exploratory* puncture, to determine the point more decidedly: a little blood, but no pus, flowed from the opening. M. Dupuytren having now made up his mind, resolved to operate, particularly as the skin of the chin was sound, and the girl, though rather thin and ill grown, appeared free from visceral disease.

The patient was seated on a chair slightly raised; the head supported by an assistant placed behind, who compressed the labial arteries as they pass over the edge of the jaw. Another assistant laid hold of the right side of the lower lip, and the operator seized that of the opposite side: the lip was thus stretched, and divided vertically by an incision commenced at its middle, and carried as far down as the os hyoides, exactly in the median line. The lip now formed two flaps, the connexions of which with the jaw were destroyed. A portion of the cheek was at the same time detached from the bone, which was laid bare a little without the two canine teeth. Before detaching the soft parts within, it was thought expedient to divide the bone, because if the opposite course was followed, some considerable vessels might be cut, which could not be easily dealt with at the moment, and much loss of blood might be the consequence. The left canine tooth, and the first molar of the right side, had been taken out before the operation was begun. On the left side the noise of the saw proved that it met with sufficient resistance; but on the right its action was noiseless, and its course made without any effort, proving that the bone on that side was not healthy, and there was, in fact, a prolongation of the disease beyond the first molar tooth—which dis-

eased portion of the jaw was also removed.

The bone being divided on either side, the soft parts within were separated. Some vessels which threw out blood in jets were cauterized with an iron at white heat. At the moment the portions of the jaw which had been asunder were observed to approximate, the two flaps of the lower lip were brought together, and retained by sutures, after which the patient was put to bed.

The diseased part consisted of an irregular vascular "element," somewhat resembling the texture of the spleen; and a cellular part, which was dense, and mixed with a little fibrous tissue.—*Ibid.*

Extirpation of a fibrous Tumor growing from the Spinous Process of the sixth Cervical Vertebra.

A young woman, rather above 20 years of age, affected with a tumor of the posterior and lower part of the neck, was admitted into the Hotel Dieu in the month of June.

This patient, who had several times laboured under venereal complaints, had an operation performed some years ago for her present disease. A relapse took place, and an operation was performed again about six months ago. Since this time a new tumor has manifested itself in the same situation, on account of which she came to the hospital. The cicatrices of the former operations were large, thick, exuberant, and, as it were, horny. The tumor, situated opposite the sixth spinous apophysis of the cervical column, appeared to rest on a portion of bone, and to be adherent to it. It was hard and unequal—of the size of a small hen's egg. There was no change of colour in the skin. Occasionally there were lancinating pains shot through it.

M. Dupuytren regarded it as a fibro-cellular tumor, the extirpation of which had been incomplete, and which probably derived its origin from the fibrous tissue round the spinous process of the vertebra. As the nature of the tumor rendered it liable to degenerate, he proposed its speedy removal; and to avoid every risk of relapse, and leave no point from which it could grow again, he resolved to cut off the spinous process of the affected vertebra. He has many times seen tumors of this kind taking their rise from the spinous processes, and has always observed that

they returned unless the point of bone from which the tumor arose was removed.

A crucial incision was made, the flaps were dissected with care, and the tumor entirely exposed and insulated. It was then easily seen that it arose from the sixth vertebra. By means of a cutting nippers, the summit of the apophysis was divided, the section being made with ease, as the bone had become nearly cartilaginous.

On examining the tumor, it was found to present a fibro-cellular mass, in the midst of which were numerous points of schirrus. The edges of the wound were brought together and lightly dressed. The cicatrization was not interrupted by any accident, and was completed on the 10th of July, the operation having been performed on the 29th of June. There is reason to believe that no return of the disease will take place.—*Journal Hebdom.*

Fatal Case of Internal Hernia.

A man, aged 63, was suddenly seized with violent pain in the epigastrium, on the night of the 26th of July: he soon after vomited bile, and passed some yellow-coloured stools. The night passed without the vomiting having ceased. Next day he took some food, and found himself a little better. On the following night the symptoms returned with greater intensity; the food which he had taken was ejected. Then followed abundance of bile, and the retching, which returned at short intervals, caused horrible pain in the epigastric region. The belly became tympanitic, and his appetite left him. Numerous enemata were thrown up, and returned immediately, with yellow feculent matters: they afforded no relief. The fourth day, sixteen leeches were applied to the epigastrium, with a short interval of relief. The bilious vomiting continuing, the patient had himself transported to the Hotel Dieu on the 3d of August. The tongue was large and moist, without redness; the pulse concentrated, and rather frequent; the extremities cold. His drink was rejected as soon as taken, and vomiting of green matters recurred every ten or twelve minutes. The belly moderately distended, yielded to pressure, which caused no pain unless it was made on the epigastrium and the inner half of the left hypochondrium. As to the rest, the physiognomy was not bad; there was no head-ache, no heat of

skin, and no abdominal tumor, to account for the symptoms. The patient stated, that he had drank a large quantity of cold water on the 26th; which circumstance, joined to the nature of matters vomited, at first gave rise to the idea of cholera-morbus, but this was afterwards abandoned, in consequence of the absence of the other symptoms characteristic of that disease. M. Recamier suspected inflammation of that portion of the peritoneum which covers the liver and diaphragm.

Forty leeches to the epigastrium; cataplasms; emollient drinks.

August 4th.—The blood flowed for several hours. The pulse is a little reduced, and the anxiety is diminished. The vomiting is at long intervals, and with little pain. The pain at the epigastrium is almost gone. Two scanty stools after enemata.

Evening.—Thirty leeches to the belly. During the night, all the symptoms returned with violence; grey and semi-stercoraceous matters being vomited every instant. The extremities cold.

5th.—Pulse small, and but little accelerated; belly more tense. M. Recamier thinks that there is an invagination or other form of ilius. Bath for half an hour. Lavement—Cupping-glasses to the lumbar region. Iced drinks.

6th.—Has vomited less during the night; the constipation remains; the extremities continue cold.

7th.—The semi-stercoraceous vomiting returned about ten o'clock this morning.

8th.—The patient is much changed. Pulse weak, but not rapid. When the hand is passed over the abdomen, the convolutions of the bowels give the sensation of numerous round and resisting elevations.

9th.—The patient died this morning.

Autopsy.—The small intestines were of a reddish-brown colour, and as large as the colon. On tracing them from the duodenum, a portion of livid intestine was discovered, which appeared to be involved in a part of the mesentery; but a more careful examination led to the detection of its true nature, which was as follows. The free end of the appendix vermiformis had contracted a pretty strong adhesion to the mesentery and the concave part of the bowel. This adhesion was two inches and a half above the origin of

the appendix. All the portion of the small intestine (about the lower fifth), the mesentery of which was limited above by the adhesion, and below by the origin of the appendix, was included under the kind of bridge formed by the appendix itself. Beyond the strangulation, the calibre of the great intestine was less than in the natural state. The small intestine was filled with yellowish fluid.—*Lancette Française*.

ST. BARTHOLOMEW'S HOSPITAL.

Phagedenic Ulcer of the Eye-lid—cured by Mercury.

LOUISA WILLIAMS, æt. 25, admitted into Sitwell's Ward, 14th ult. under Mr. Earle, with a foul-looking ulcer, of a strongly phagedenic character, occupying the whole of the right superior palpebra; involving in its destructive progress the conjunctival lining of the lid to some extent. The external surface of the ulcer is covered with a dry, hard, and brown scab. She suffers acute pain in the lid itself, and over the brow.

The patient is a fine healthy-looking young woman, strictly denies having been ever affected with syphilis in any form, and refers the origin of the disease to a cold taken two weeks back, when she had a small hordeolum, which broke, and gradually increased in the form of an ulcer.

The hard crust was removed by fomentations and poultices, and the argent. nitrat. freely applied to the whole external surface of the ulcer and to the conjunctival lining, as far back as the diseased parts could be exposed.

17th.—After this application the pain was not so severe, but the ulcer still preserved its malignant character. The lotio nigra was kept constantly applied, and she was ordered to take

Hydrarg. Oxy. mur. gr. $\frac{1}{8}$, Essens. Sarsæ, \mathfrak{z} ss. ter die.

21st.—The ulcerative process is spreading; the upper edge and some other parts of the sore have an ash-coloured appearance, with bloody points. To these the undiluted nitric acid was applied.

Cont. Med.

23d.—Ulcer still gaining ground. Mr. Lawrence saw the patient, and advised the use of mercury, so as to induce speedy salivation. She was accordingly directed to take

Hyd. Submur. gr. ij.; Opii Pur. gr. $\frac{1}{3}$, 4ta. q. h.

26th.—Mouth affected. From this time the appearance of the whole ulcer gradually improved. The hard crust, which was formed a second time, was detached, exposing beneath a perfectly healthy granulating surface.

29th.—Calomel and opium discontinued. The mouth much affected.

In a few days she left the hospital, and there was reason then to hope that sufficient adhesion would be formed between the upper and lower lid, at the outer canthus, to prevent ectropium to any extent.

MIDDLESEX HOSPITAL.

Tracheotomy for the extraction of a foreign body.

SEPT. 1.—A little girl was eating a plum, and laughing, when her schoolmistress reprimanded her with a slight slap on the cheek. The sudden inspiration drew the stone of the plum into her windpipe, and she was seized with a fit of choking, which was continued with more or less violence from ten o'clock till half-past twelve. The suffering of the child, its almost total exhaustion, and the convulsive twisting of her body, excited the highest interest. Emetics proved of no use, and instruments passed into the throat could ascertain nothing.

Under these circumstances Mr. Bell cut into the fore-part of the windpipe, and with a bent probe hooked up the rough half of plum-stone, which lay behind the hollow part of the neck, and seized it with a pair of forceps.

At one time the child was nearly dead, but the operator passed a tube to let it breathe freely, until the freshness of its complexion returned; when he completed the operation. Although the child lay apparently insensible, no sooner was the plum-stone extracted than she gave evidence of immediate relief; and two or three days have passed without her suffering any inconvenience from the operation.

7th.—There has not been a single untoward symptom, and the child is now nearly well.

ST. GEORGE'S HOSPITAL.

Cases of Obscure Intermittent Affections.

THE prevalence of intermittent affections during the last few years, and that in localities supposed to enjoy an immunity from ague, has been much remarked. But, independent of open undisguised intermittents, many have occurred under simulated forms, and assumed the characters of other diseases, generally unaccompanied with any such type. The two following cases, though by no means extraordinary examples of the fact, may yet be worth recording.

CASE I.—*Obscure Tertian Ague, ultimately cured by Bark.*

Edward Jarratty, æt. 19, cad to a stage coach, was admitted June 10th, under Dr. Seymour. He complained of nothing but weakness, had no pain in any part of the body, no head-ache, no thoracic nor abdominal symptoms. He looked thin and ill.

He had been attacked, six days previously, with pain in the head, which, however, passed off in the course of twenty-four hours, and since that time had never re-appeared. He had been getting weaker daily, and had applied at the Westminster Hospital, where he was bled. A suspicion of the existence of intermittent symptoms arose on cross-questioning the patient, but it was too obscure and indistinct to be depended on.

Hausus Sennæ.

11th.—Passed a bad night, and had some shivering this morning, succeeded by heat of skin and perspiration. Takes a full inspiration without pain, but complains of a little cough.

13th.—Was very well all yesterday, and walked about the ward. In the night he had shivering, followed, as before, by heat and perspiration, and is now in bed with flushed face and wet skin.

On the 14th he was again apyretic, and little doubt being entertained, by this time, of the nature of the complaint, he was ordered—

Quin. Sulph. gr. vi. Decoct. Cinch. 3vss.
Tr. Cinch. Tr. Rhei aa. 3ij. Fiat
mistura cujus. Capr. coch. tria max.
ter die.

15th.—Had a slight rigor last night, but it was extremely mild, and followed by little fever. To-day he is in bed, but perfectly free from complaint.

Pergat.

17th.—Pulse natural, tongue clean, bowels constipated. Some slight shivering yesterday.

Middle diet. Olei Ricini, 3vj. o. m.
Repetr. alia.

The shivering never returned after the 16th, and on the 24th the patient was discharged cured.

In reference to the above case, we may simply remark that it was really more obscure than it appears to be on paper. It requires no exertion to read that the patient had a shivering, &c. on alternate days; it was much more difficult to sift those circumstances out.

CASE II.—Obstinate Vomiting—Suspicion of Ague—Employment of Bark—Cure.

William White, a servant, ætatis 37, admitted July 24th, under the care of Dr. Chambers.

Vomits every thing he eats, mixed with sour fluid, in half an hour, or thereabouts, after his meals. The vomiting is preceded by pain in the region of the stomach. Solids are more distressing than fluids, so that he is compelled to live upon slops. No hæmatemesis. He is feverish; pulse 72; tongue slightly furred; bowels very costive; urine quite red. No tumor can be felt in the epigastrium.

Has been ill for six weeks. Was first

seized in the country with violent pain in the stomach, soon after which the vomiting appeared, in much the same way as at present. He attributes his ailments to cold. Has taken only blue pill.

R. Aq. Menth. vir. 3iss. Magnesiae
Sulph. 3j. Magnes. Carb. ʒj. Tr. Hu-
muli, 3ss. M. ft. haust. ter die sumen-
dus. Pilul. Hydrarg. gr. v. o. n. Diæta
lactea.

27th.—Another very careful examination has been made, but no tumor can be felt. He vomited on the 25th, but not since. Bowels costive; urine scanty, and “like porter.”

Haus. Sennæ statim: Repetr. alia.

The senna was repeated on the 31st, and on the 5th of August the quantity of sulphate of magnesia was augmented to two drachms in the draught before prescribed.

Aug. 8th.—Has now no regular vomiting, but complains of pyrosis, heart-burn, loss of appetite, and costive bowels. Last night he had a rigor, followed by heat and some sweating. On recollection, he thinks that he has felt cold and chilly, with subsequent pyrexia, almost every night during his stay in the house. He has come from a part of the country where every body about him had ague; where he resided two years and a half; where he was exposed to damp and cold; and, finally, where he never enjoyed good health, though he never had an intermittent.

Mist. Æth. c. accidente rigore.

10th.—Looks thin and wan. Some cough. Little vomiting. Tongue white and moist. Has had no shivering since he began the æther draught.

Sum. Quin. Sulph. gr. iij. c. Extr. Conii.
gr. iij. 6tis horis.

Repet. Haust. Ætheris accidente rigore.

12th.—Pergat.—Sod. Carb. gr xv. ex aq.
pauill. pro re.

17th.—Complained for the two last days of pain after drinking. Relieved by vomiting. No attack of shivering and pyrexia since the first exhibition of the quinine, but feels chilly, which, considering the state of the weather, he may very well do.

Infus. Cascarill. 3xij. Tr. Cinch. Ammon.
3j. ter die. Omit. Quin. Sulph.

21st.—Pyrosis during the night so severe as to keep him awake. No vomiting as before, but the medicine makes him sick. Tongue clean; bowels open; urine free.

Haus. Salin. c. Magnes. Carb. ʒj. Tinct.
Op. m. ter die.

Emplast. Opii epigastrio.

24th.—Makes no complaint whatever, and the change for the better in his appearance, within the last week or ten days, is remarkable. Cured.

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SATURDAY, SEPTEMBER 19, 1829.

CLINICAL

LECTURES ON ELEPHANTIASIS.

By M. BIETT.

*(Taken for the MEDICAL GAZETTE, by a
Correspondent in Paris)*

LECTURE I.

THIS case is a very severe instance of elephantiasis in a white lad, 17 years of age. His father was a native of France; his mother born in the colony of Guadaloupe, of which he also is a native. He was sent into this country, (France), to a school at Bourdeaux, where a slight eruption appeared. The physicians who were first consulted, however, did not recognize the disease, but treated it as a matter of no consequence. The boy was shortly after removed to a school at Paris, to finish his education, when several patches appeared on different parts of his body. The disease was again not recognized by his medical attendant—it increased; and he was admitted into the Maison Royal de Santé, under the care of the celebrated Dubois, who immediately detected its nature, and tried various remedies: among others, iodine and muriate of gold, without any mitigation of the symptoms. He has been in Saint Louis nearly three months, but is too far gone to make any active treatment practicable. His whole body is covered with large tubercles; but the violence of the disease is most manifest in the face, his features being so distorted that it is difficult to distinguish them. He can scarcely open his eyes, but the conjunctiva does not appear to be affected. The lips are also much swelled. There are two perpendicular furrows in the

forehead, giving one the idea that the corrugatores supercilii are preternaturally contracted. His voice is much altered, and his countenance has a livid aspect. The tongue and pharynx also are affected with the disease. The mind remains perfect; so, also, the sensibility of the skin; which, though it is so much diseased, is not more tender than usual: his general health does not seem to be much affected. None of the tubercles are as yet ulcerated.

This disease is always connected with climate: it is contracted either by residence in the countries where it prevails, or the disposition to it is derived by descent from those who are natives. The ancients were well acquainted with it; and it has been described by many authors; among others by Aretæus. Galen, also, saw the disease when he followed Pompey into Egypt. Elephantiasis was brought into Europe by the Crusaders. Many of those who remained several years in the East returned with it; and the order and institutions of Saint Lazarus were founded for the benefit of the sufferers. An immense number of cases are recorded in the accounts of this institution; but there is good reason for believing, that either from compassion or ignorance, patients affected with other diseases of the skin were admitted. Many contemporary Roman ecclesiastics have described the malady very accurately; and they attributed it always to a curse upon the sufferers on account of some egregious sin. As they were deemed impure, it was considered improper to approach them. The same prejudice has existed from the earliest times. It has its origin, it is to be presumed, in the ordained separation of

lepers under the Levitical law. As the features of this disease are very remarkable, it has occupied much of the attention of travellers in the countries in which it is met with; among whom we may particularly mention Pocock, Bruce, and Marsden. It is so readily recognized that we may easily account for the number of unprofessional travellers who have mentioned it.

Some have stated that it is always accompanied with great feebleness of mind; and, in its worst stages, even with idiocy. This, however, is untrue, for M. Biett has seen several cases in which the intellect was not at all affected; and during the last year a patient of his, a girl from Martinico, died under his care. So far from her mental powers having been in any respect weakened, they were to the last moments of her existence stronger than usual. It has been said, also, that the body is more than usually feeble: this does not accord with M. B.'s experience; the patients, in all the cases he has seen, have retained their physical strength in great activity, even to a very late period of the disease.

The first symptoms of the complaint are a number of light bronze-coloured spots on different parts of the body, accompanied by a slight tumefaction, which has a very peculiar appearance, being somewhat pale and glossy. By a careless observer it may, in this stage, be easily confounded with psoriasis guttata: the tumefaction, however, will distinguish it. At this juncture there is sometimes, but by no means frequently, an increase of sensibility of the skin. The patches continue to swell, and ultimately become small tubercles, which have at first the appearance of rounded papulæ. These tubercles have, by the earliest describers of this disease, been divided into two kinds; one, a tubercle of the skin alone, which is hard, distinctly circumscribed, horny, and having a depression in the centre. The other, an affection of the subcutaneous cellular membrane, partaking in its nature somewhat of the character of a product of chronic inflammation. These are softer, larger, and less distinctly circumscribed, than those of the skin. The progress of the disease is sometimes rapid, sometimes not. As it increases, the swelling becomes more universal, developing itself on the trunk and limbs, but with more inten-

sity on the face. The eye-lids, cheeks, and lips, being principally affected, give the countenance a peculiar expression, known to the ancients under the name of leontiasis. Among the ruins of Pompeii many statues have been found having this remarkable expression. It is principally distinguished by deep furrows, separating the cheek from the nose and lips; as, also, by the two deep lines on the forehead, observable in the case before us. As the disease proceeds the tubercles become more developed; the lips and cheeks more swelled; and the conjunctiva becomes affected, giving it at first the appearance of a livid ulceration;—its follicles acquire an immense size. The disease now spreads into the mouth and tongue; the pharynx becomes affected; and shortly after the epiglottis. It then spreads down the windpipe, and attacks the glottis. At this time a very remarkable alteration takes place in the voice, which also has not escaped the notice of ancient writers; among whom St. Luke, who, in speaking of the ten lepers who were healed, (17th chapter), notices specially that he who returned glorified God with “a loud voice,” or, more strictly translated, *a full voice*. The diminution of the voice gains ground till it is entirely lost. This is not occasioned by enlargement of the glottis itself, but by ulceration of tubercles in it. The disease proceeds down the œsophagus into the alimentary canal, which thus becomes diseased. The general health suffers; the patient is now in a melancholy state; all traces of natural countenance are completely lost; sensation is destroyed; the respiration becomes difficult from the increasing ulceration of the tubercles in the windpipe, and on the epiglottis. The unfortunate patient goes on from bad to worse, till he dies exhausted. This, however, is not always the case. He may have the disease in its chronic form, and life be prolonged to old age, or he may finally die of some other complaint. It has been said that in these patients there is more than a natural desire for sexual intercourse: to this state the ancients have given the name of *libido inexplibilis*; and one author goes so far as to relate that a patient in one of the Lazarettos in Italy, being affected with elephantiasis, committed a rape on one of the nurses, who consequently became affected with the disease; so that it was

found necessary to give the woman up entirely to him ; but this case, M. Biett observes, bears upon the face of it the stamp of untruth, as the disease is known to be incommunicable by contagion. Indeed, its increase of the genital powers has been denied by writers at various periods ; and M. B. himself has seen nothing in his own experience to lead him to believe it, but directly the reverse, as the following case will illustrate. A boy, vigorous and strong in every other respect, was attacked before the age of puberty. The genital organs were not perfectly developed till the age of 23.

Among other symptoms of this disease, he mentioned that the skin was of a bronze tint, the eruptions having a glassy appearance ; some tubercles inflaming and suppurating, others ulcerating. It occasionally happens that a very vascular layer of cellular membrane is found under the skin : this was the case with a girl from the island of Bourbon, whom M. Biett examined last year. The mucous membranes are often found deeply implicated ; the conjunctiva much swelled, and highly vascular, yet the sensibility to light is not always increased ; on the tongue a great cluster of tubercles are formed ; in the larynx, also, they exist in great numbers. They are sometimes found on the *cordæ vocales* ; and there is a good deal of mucus in the larynx. The follicles of the stomach are much enlarged, and the alimentary canal suffers from follicular ulceration. M. B. does not think this the same kind of ulceration as exists in fever, as these ulcers never cicatrize. He once, indeed, saw a cicatrix in the alimentary canal of one of these patients, but upon a more minute examination, he perceived it to be an old one, and that it was most likely the remains of a different species of ulceration. Tubercles have been met with in the lungs ; but M. Biett is inclined to think that they are not seen commonly in that situation, as some authors pretend : he has never observed them himself, and his own experience leads him to think that the lungs are less frequently attacked than any other viscus.

LECTURE II.

M. Biett commenced his lecture this day with the history of another case which he exhibited. A boy, about thir-

teen years of age, born at Guadaloupe, of French parents, came into this country (France) in the year 1827 ;—a few yellow patches had appeared on different parts of the body, which vanished under the internal and external use of sulphur. At the latter end of the year they re-appeared ; the disease was not understood, and no active treatment was employed. Upon all parts of his body, but particularly on the face, are observed a number of large patches of a pale red, or fawn colour, which are perfectly insensible, and but very little raised above the level of the skin : he is much wasted, but particularly in his hands and feet, which present an appearance very characteristic of this form of the disease : the palm of the hand dry, wrinkled, and shining, resembling that of a shrivelled old man ; the fingers are all ankylosed, in a state of semi-flexion ; they are remarkably thin, particularly about the joints, which appear as if the ends of the bones would soon protrude through the skin, and are in other respects in the same state as the hands, except that upon each of them and on the knee are two or three hard horny tubercles, which are deeply ulcerated ; the ulcers have a peculiar appearance, the edges being of a light greenish colour, and semi-transparent, like horn ; the ulcer is deep, very much like a little cave whose cells are composed of this peculiar substance, and they are very painful. This species of elephantiasis differs somewhat from the other ; it has been well-named and described by Dr. Robinson, of Calcutta. The boy has taken iodine constantly since he has been in the hospital, with but few intermissions, and with such decided benefit that M. Biett has hopes of his recovery. The patches have nearly all disappeared, but the ulcers are stationary. His general health has not suffered much.

Before proceeding to the diagnosis of this disease, it may not be lost time to give a short account of the various opinions which have been entertained concerning it. The ancients all concurred in believing it to be an affection of the skin alone : others again, among whom are the Hindoos, consider it as an affection of the whole system, and the consequence of some outrageous crime. Mr. Plumbe says, it is not an affection of the skin only, for that will not account for the languor and apathy with

which the disease commences: but M. Biett believes that, though Mr. Plumbe has come to a right conclusion, yet he has deduced it from wrong premises, for apathy and languor are by no means the usual forerunners of the complaint: he has seen several cases in which neither the spirits nor muscular power were affected in the slightest degree. M. B. thinks it is originally an affection of the skin; but that when the vital organs are attacked it becomes constitutional. Dr. Robinson, of Calcutta, divides Elephantiasis Græcorum into two species. 1st. Elephantiasis Græcorum Anaistotos, which is characterized by large yellow spots extending over different parts of the body; these desquenate, then gradually tumefy, the tumefaction terminates in ulceration of the parts affected, and death. And 2dly. Elephantiasis Græcorum Tuberculata, described in the former lecture: there is another species, called by the French writers the "*Malheureuses de Cayenne*;" and Dr. Good talked of two more, the *Italica* and the *Asturiensis*. The first of these M. B. does not believe to have existed, as he cannot find any traces of it in books, nor has he seen any instances of it.

Elephantiasis has been considered to be hereditary, and the ancients agreed in thinking it so. All the cases, however, which M. B. has seen, have been accidental*. It manifests itself at all ages, and in both sexes: M. B. has seen 14 men affected with the complaint, and only six women. The disease has undoubtedly something to do with climate: it seems to be always necessary that the parents or children should have resided in some tropical climate. As the disease occurs in particular climates, M. B. would endeavour to examine whether there is any peculiarity common to those in which it is found, and absent in others in which it is not. In Egypt, for example, the disease is ex-

ceedingly common: Strabo, among ancient historians, and Volney, among modern travellers, has pointed out the excessive variations of its atmosphere. The latter informs us that he has known a day in which the thermometer stood at 37° of Reaum. while at night it has fallen to 3°. Again, the tempestuous winds produce very peculiar effects on certain constitutions, and the annual inundations of the Nile must fill the air with moisture. Abyssinia, on the other hand, is dry and hot; and it is nearly free from the disease. On the continent of Africa the disease is more common; as also in the islands of France, Bourbon, and Madeira, where they are subject to great variations of the thermometer, and very heavy dews. We find also, that in the letters of Columbus to Ferdinand and Isabella, he mentions that the country is affected with this horrible malady, which he attributes to the thermometer varying 20° in 24 hours. In all these countries the poor are more subject to this disease than the rich: it is obvious that the rich can guard themselves better against the changes of temperature by artificial means. Ainslie, in his work on the diseases of India, thinks that Europeans are more free from the disease than natives, and the English more than other Europeans. M. B. thinks that the first part of this opinion is correct, but does not believe the latter, as he has been consulted by three or four English persons affected with the disease; but granting that this is the case in India, as Mr. A. asserts, and that he never saw an Englishman affected with the disease, the cause must be found not in a peculiarity of their nature, but in the luxury in which the English indulge themselves in that country.

Wet clothes, or sleeping on the ground, may be reckoned among the exciting causes. Sir Charles Stuart says, that the fishermen on the coast of Coromandel, who are much exposed to these hardships, are peculiarly liable to the disease. The same circumstances which predispose to other diseases of the skin, have their effect upon this: Habitual costiveness (a very common predisposing cause of eruptive diseases), grief, and anxiety, have brought it on frequently. M. B. was consulted by an Englishman who had made a very large fortune in the West Indies: as he was no miser, he possessed every comfort

* I have seen an instance in which the father, a native of Barbadoes, is a victim to this disease (Elephant. Tuberc.); the mother free from it—the eldest child severely affected, at six years of age; she had the countenance of a full-grown woman: the eyelids thickened; the skin and integuments livid, doughy, and tuberculated. She has been a good deal benefited by the constant use of sulphur, and a residence in England. She was seized with measles, which, after it had run its course, left the parts in a very improved state; but she fell back a few months afterwards into nearly her former state. The other child, three or four years old, had one or two small tubercles on the face, and one on the body.

that could be wished for, but he attributed the appearance of the disease to the overwhelming care and anxiety attendant on the carrying on of his extensive concerns. It has been said that a taint may be acquired and lie dormant in the constitution for a long time: M. B. thinks this probable, but it is too difficult a point for him to determine.

Is the disease contagious? The ancients thought it was; so did they think every serious disease contagious: it is no wonder, therefore, that they should ascribe this quality to a malady so formidable in its ravages as this. Some moderns have been of the same opinion. Darwin and Cullen are among the number, but they seem to me (said M. Bielt) to have taken the reports of others for granted, and the prejudices against lepers have strengthened them: but be assured that all the best writers of latter times have been of opinion that Elephantiasis is not contagious.

[To be concluded in our next.]

EXTIRPATION OF THE PAROTID GLAND.

To the Editor of the London Medical Gazette.

August 22d, 1829.

SIR,

I FORWARD the substance of the thesis on extirpation of the parotid gland, to which I alluded in my former communication; and have added a few observations, which, however, you are at liberty to retain or reject as you think proper. Though the fact of the entire extirpation of this gland is now determined beyond dispute, the operation appears to be almost discountenanced by many surgeons*, as not likely to be of any important advantage, in consequence of the difficulties attached to its performance, and the danger and uncertainty of result which have hitherto attended it. In fact the manner in which I have heard it spoken of by some anatomists, is calculated to deter any one from attempting it; viz. by way of giving an idea of its difficulty, they suggest an attempt at extraction, after the gland is injected with quicksilver, without opening any

of its convolutions, and allowing the escape of the fluid. Now, besides that the healthy condition of the gland is widely different from its scirrhus state, the induration of which might, I conceive, rather facilitate its entire removal, no one would set about it with the idea of turning it out sound, and untouched by the scalpel. It may be wholly removed, with tolerable facility, in the dead body by successive layers, and picking away the more deeply situated portions with the forceps and scissors. I have no intention in mentioning this of drawing any parallel between the facility of operations on the dead body and living subject. The practicability of the latter will, I think, be fully proved by the cases contained in the following thesis, on extirpation of the parotid gland, presented and sustained by Antonie Auguste Pillet, of Lyons, at the Faculty of Medicine of Paris, June 16th, 1828. Addressed to M. Gensoul.

M. Pillet commences by a retrospect of the numerous instances of the performance of this operation, published in the course of the 18th century; and comes to the same conclusion as Richter, that as many of their authors have omitted to particularize the parts interested in the operation, we may fairly presume that the operators have been led to suppose they had abstracted the parotid, when they had merely dissected out an enlarged lymphatic gland, or other tumors situated upon it.

M. P. believes this to have been the case in the observations recorded by Verduin, Gooch, Behr, Palfin, and Scultetus; and considers his opinion confirmed by a passage in one of the authors on this subject, where he announces that hæmorrhage never follows ablation of the salivary glands, and regards as perfectly useless the precautionary means adopted against it. "But if we decide on rejecting the authenticity of these operations, at least as instances of total extirpation, what can we think (asks M. P.) of analogous cases by authors combining profound anatomical knowledge with surgical talents? Of those of Heister? who first laid down precise ideas on the operation; and who cites, in proof of its possibility, the case of a student on whom it was performed, but who died three days afterwards of hæmorrhage from a wound of the carotid, which the operator was

* Allan Burns, Boyer, and Richerand, have all expressed themselves strongly against it.

either unable or too timid to arrest*. Of the testimony of Acrell† and Siebold‡? both of whom have recorded successful cases. And of Souscrampe's operation; to be met with in the 84th vol. of the *Journal de Medicine*? These facts, too, have been rejected by the generality of surgeons, believing that enlarged glands, or other tumors, have been mistaken for the parotid, which being compressed, nearly wasted, and concealed behind the maxilla, had escaped the bistoury. In support of this opinion, a circumstance which occurred to Boyer is cited. Having removed a tumor, as large as the fist, situated in the region of the parotid, he penetrated so deep, and tied so many vessels, that he concluded he had taken away the parotid; till, on carefully exploring the cavity, he recognized that gland very distinctly, remaining untouched behind the posterior border of the jaw. And another professor of this school affirms that the operation has never been performed. Struck by the contrariety of opinion on a question apparently so easy of solution, I thought it would not be without interest to collect some recent instances of the operation, performed by surgeons whose ability and good faith could not be suspected; and to add the pathological results gathered from the fatal cases, in order to throw their united light upon this point of operative surgery. Setting aside, therefore, all the operations recorded during the last century, as nearly all liable to furnish matter for cavil, a sufficient number still remains as ample testimony in its favour.

"No one, I conceive, will question the authenticity of the operation performed by Beclard, in 1823§. The patient died a few days afterwards; and it was readily ascertained that the surgeon had not deceived himself. The year following it was repeated by M. Genson||, and a second time in 1826; successfully in both instances. The next two that present themselves, by Klein of Stuttgart, and Prieger|| of Kreuznach, reported in

Graffe and Walther's *Journal*, bear a great resemblance to those above-mentioned by Verduin and Scultetus, and may be passed over as doubtful. In England, however, Mr. Goodlad, of Bury, has lately extirpated this gland, forming an immense tumor at the left side of the face and neck; prefacing the operation by the ligature of the carotid. The cure was not lasting. The patient sank under a return of the disease, fifteen months afterwards*. A case of the same nature occurred to Mr. Carmichael, with successful result; but leaving paralysis of the muscles of that side of the face†. In France the operation has been lately practised by M. Lisfranc‡, 1826; and the same year by M. Idrae, of Toulouse. In the former death took place on the sixteenth day after the operation§; and the examination, conducted in the presence of the members of the Academy of Surgery, completely satisfied them as to the fact. As to the operation of M. Idrae, published in the *Ephemerides Medicales de Montpellier*, the extirpation of the entire parotid may appear somewhat doubtful. It is not easy to comprehend how M. I. could have carried into execution the deep dissection he describes, without opening a vessel or needing a ligature, except to the central pedicle of the tumor, in which pulsation was felt; unless either the parotid itself had been singularly flattened and forced inwards, and thus overlooked, or the vessels had been obliterated by the pressure, of which circumstance M. Lisfranc alone has made mention."

M. P. next goes through the anatomical relations and structure of the gland; and then speaks of other methods of extirpation, described by several surgeons. Of that by a single ligature, proposed and executed by Rookhuysen; and by numerous ligatures, practised by a Swiss surgeon, both probably for tumors of lymphatic glands. Of the use of caustic also, recommended by Desault and Chopard, but attended by too great inconveniences to be adopted in practice.

Having taken this survey of the history of the operation, the author pro-

* Vid. *Commercium Litterarium Norimbergæ*, An. 1733, p. 61.

† Comment. Lepsie, Supplem. p. 659.

‡ C. G. Siebold, *Parot. schirros. felic. ext. hist.* Erfurti, 1781.

§ Archives Gen. 1824. Johnson's *Journal*, June 1824.

|| A second case by Dr. Prieger, is published in the 2d No. of Rust's *Magazine* for 1825, and given from Dr. Johnson's *Journal* for July 1826, at the end of this thesis; of the authenticity of which there can scarcely be a question.

* Med. Chir. Trans. Vol. 7.

† Trans. of King's and Queen's College. Vol. 2d, Dublin.

‡ Revue. Med. 1826. Johnson's *Journal*, April 1827.

§ From ulceration in the coats of the stomach, the wound being very nearly healed.

ceeds to the detail of the two operations of M. Gensoul, from notes furnished by himself.

The first case is that of "Jean Michel Fauce, æt. 63, a manufacturer of Lyons; of a strong constitution, and sanguine temperament. He first perceived the tumor over the right parotid, April 1824; it was then about the size of a bean, and remained stationary for a short time. It soon, however, made rapid progress; the skin became red, ulcerated, and a greyish sanies was poured forth.

"At his entrance into the Hotel Dieu, July 16th, 1824, the tumor had acquired the size of a hen's egg, and was the seat of such severe pains as to deprive him of sleep entirely. It did not appear adherent to the parotid. A limpid serous fluid was constantly discharging from some fistulous orifices at its upper part. I plunged a lancet into a point where fluctuation was manifest, and gave exit to a small quantity of blood mingled with streaks of a grey matter. Some days afterwards, the man suffering but little, believed himself cured, and left the hospital contrary to my wishes; but, as I had foreseen, soon re-entered it, on the 4th of September following. The tumor, having been improperly irritated by topical applications, had then acquired a more considerable volume; the edges of the ulcer were tumid, everted, and of a greyish aspect; and furnishing a foetid sanies in abundance. The tumor, before moveable, now seemed fixed to the parotid, which was itself enlarged, and very painful—compared by the patient to needles plunged into the part. I directed some leeches to be applied round the gland, and repeated them some days afterwards, with the effect of reducing the surrounding swelling a little, but not checking the progress of the disease. Sloughs formed upon the ulcer, now daily increasing, and exhaling the peculiar odour of cancerous affections. The rapid increase of the ulceration, and the sufferings and despair of the man, prevailed on me to yield to his entreaties, and decide upon attempting the extirpation of the disease; and I proceeded to perform it on the 20th of Sept. 1824. Having placed the patient conveniently, I surrounded the tumor by two semi-elliptical incisions, of six inches in length, in the long diameter of the gland, leaving an interval of three

inches in the middle between them. After having separated the tumor from the masseter, the edge of the lower jaw, and the mastoid apophysis, I endeavoured in vain to break through its deep adhesions. The blood now flowed profusely; and the size of the tumor interfering with the dissection at its base, I detached that portion which was free, whilst the fingers of my assistants restrained the hæmorrhage. The dissection was continued with the aid of a director and the nails; and, lastly, what remained of the gland was seized by the forceps, and cut away by the scissors, curved in their flat direction.

"Eleven arteries were tied successively, including the external carotid. The facility with which I was able to pass my fingers over the masseter, pterygoid, and sterno-mastoid muscles; the posterior border of the jaw, and the styloid and mastoid processes, satisfied me beyond doubt that I had abstracted the entire parotid. I then brought together the lips of the wound, and retained them in contact by adhesive straps, and directed the application of very cold water frequently, to moderate the intensity of the inflammation. The tumor was composed of a mass of gangliform tubercles, of greyish structure, lardaceous, and elastic; some of them softened, and containing fluid. Beneath them a decidedly scirrhus structure presented itself; and beyond that some glandular granules of the parotid were recognized, slightly increased in volume. The trunk of the facial nerve was seen on the posterior surface of the tumor; and at its anterior border, a portion of the stenonian duct. The wound proceeded regularly towards cicatrization; and when the patient left the hospital, Oct. 28th, it was reduced to the size of a ten-sous piece. Some fungous vegetation on the surface obliged Fauce to return, Nov. 11th; and I immediately cleared away every particle which appeared of a scirrhus character. After the healing of this wound, however, lancinating pains and induration were perceived in front of the tragus; and the anterior part of the cartilage of the meatus auditorius, together with the tragus, were removed.

"The effect of this proceeding was the disappearance of the pains, and the perfect cicatrization of the wound; and he finally left the hospital, Jan. 9th, 1825. The muscles of the face on that side were

paralyzed, but not completely, and he appeared to regain power daily.

"Fauce had scarcely left the hospital, when he determined, as he said, to celebrate his recovery; and, abandoning himself to his favourite liquor, *cau de vie*, he gave himself up to most complete drunkenness some days. It was not long before a severe inflammation of the gastro-hepatic apparatus developed itself; and after suffering the consequences of his imprudence for some months, he sank under the disease, June 16th, 1825, six months after the healing of the wound.

"The dissection exhibited a fibrous substance behind the angle of the jaw, supporting the cicatrix; the meatus auditorius, facial nerve, carotid artery, and parotid duct, divided as described above; and not the smallest vestige of the parotid gland.

"I removed the gland on the opposite side, for the sake of comparison, and it was impossible to discover any sensible difference between one side and the other.

The gastro-duodenal mucous membrane was of a reddish violet colour. The liver much enlarged, and filled with tubercles, some of them softened, and containing fluid similar to the yolk of an egg. The heart was small; the large vessels strongly injected."

"The second case is as follows:—Eleonore Torque, æt. 39, of strong constitution, and habitually regular, having enjoyed perfect health all her life, became aware, at the commencement of 1821, of the existence of a tumor in front of the lobule of the left ear, at that time as large as a nut. It was moveable beneath the skin, which was not altered in colour, and pressure gave no pain.

"After some time it increased considerably, and she consulted several physicians of Grenoble and Lyons ineffectually. Very shortly, acute pains shot through the tumor; and it augmented in size to such a degree that she determined upon entering the wards of the Hôtel Dieu, April 1826, and to undergo any operation which might be necessary. It was now as large as the double fist, hard, unequal, indolent, and without any alteration in the colour of the skin, and extending from the zygomatic process over the superior third of the neck.

"I proceeded to the operation, April

17th, in the presence of several distinguished surgeons of this city, and a great number of pupils.

"Taking my station on the left side, with a convex bistoury, I made a vertical incision, of seven inches in length, from the zygoma to a point about two inches below the angle of the jaw, through the skin, which I dissected back carefully. Having thus exposed the tumor, it was raised with a hook; its circumference adhered to the neighbouring parts by loose cellular tissue, through which I dissected from below upwards with much circumspection. Notwithstanding all my care, the external carotid was divided, and having placed a ligature upon it, the operation was completed without the interruption of any other accident. The deep cavity left by the abstraction of the tumor presented, in front, the masseter; behind, the anterior border of the sternomastoid muscle; superiorly, it was bounded by the zygoma; in the depth of the cavity, and below, the finger came in contact with the styloid process, and the muscles attached to it. The internal carotid artery, the internal jugular vein, and pneumo-gastric nerve were exposed near their entry into the base of the skull. The nerve of the seventh pair had been divided at its exit from the stylo-mastoid foramen.

"The wound was dressed in the same way as the preceding. The ligatures separated on the fourteenth day; and it was completely healed by the thirtieth, leaving paralysis of that side of the face."

Before giving the conclusions which the author has added to his thesis from Berard, the second operation of Dr. Prieger, and a successful case by Mr. Kirby, of Dublin, may be cited, to give them still greater weight. The subject of the former was a woman, æt. 43, mother of eight children, and of a weak constitution. The tumor had gradually increased, from its first appearance nine years before, till it had reached an enormous magnitude, protruding over the zygoma superiorly, the chin inferiorly, weighing the face down upon the breast on that side, and extending backwards over the mastoid process. Its breadth across the lower part was eight inches.

The tumor now began to be painful and red, and the patient daily more cachectic; and Dr. P. performed the operation the

second day he visited her. There was some difficulty in dissecting the tumor from its adhesions, and turning it out. The carotid was laid bare, but not divided. The portio dura, and inferior maxillary nerves, were cut through, and eleven arterial branches secured. "Not a trace of the gland itself, or the glandula accessoria, was allowed to remain." The tumor weighed three pounds and a half, apothecaries' weight; but the description of its structure is very undefined; "uneven, tumulated, and of a very fine consistence." The operation was performed on the 7th of Sept.; on the 20th the ligatures were withdrawn; and on the 1st of October the patient left the hospital perfectly cured.

Mr. Kirby's case is detailed in the April No. of Dr. Johnson's Journal for 1826; and from the particulars of the operation, no doubt can be entertained of the entire removal of the parotid. Mr. K. states that Sir A. Cooper, in a letter to him, mentions that he twice removed the parotid in one year.

The conclusions drawn by M. Berard from the single operation of Beclard, are fully warranted by the above cases; viz. 1st, that the parotid in a scirrhus state can be entirely extirpated; 2d, that the carotid, and its larger branches, are of necessity implicated in the operation; 3dly, that it is impossible to spare the facial nerve; and, therefore, that paralysis is an inevitable consequence.

With regard to the propriety of securing the carotid before commencing the operation, it is worthy of remark that Mr. Goodlad's case was the only one in which it was performed. In MM. Beclard's, Lisfranc's, Gensoul's, and Carmichael's, it was tied during the operation; and in Dr. Prieger's and Mr. Kirby's no mention is made of the trunk of the external carotid requiring ligature; in the former it was left untouched. Although it would undoubtedly be a measure of security, there appears to be no very urgent motive why it should precede the removal of the parotid; and there must be many cases where, from the size of the tumor, it would not be practicable.

If we may consider as criteria of the authentic instances of this operation, the division of the external carotid, and its larger branches; of the portio dura and parotid duct; and the exposure of the styloid and mastoid processes, and the muscles arising from them, we have

upon record eight cases placed beyond all doubt, five of which were perfectly successful: we may, I think, say six, including M. Lisfranc's.

The character attributed to them, that of true scirrhus, may not have been correct in all of them, knowing the loose meaning applied to the term by the French; but other disease may render the operation necessary, and should the extreme urgency of a case demand it—as that alone can sanction it—after such favourable results as those above recorded, I imagine no surgeon will consider its danger and difficulty so considerable as to render extirpation of the parotid unjustifiable.

I remain, sir,
Most respectfully, yours,
H. T. C.

CASE OF A STILL-BORN CHILD

That had been retained in the Uterus thirteen Calendar Months.

(Communicated through Dr. JAMES JOHNSON.)

To the Editor of the London Medical Gazette.

SIR,

THE subject of this extraordinary case is a small active woman, aged 38, in good health, and the mother of seven children exclusive of this. About the beginning of July, 1828, she missed the catamenia, which should have appeared at that time, and soon after found herself pregnant. In October following she quickened, and felt the motions of the child till January, when they ceased, and never returned. She had continued to increase in size till that time, but afterwards decreased, and felt only a sensation of a lump in the lower part of the belly, towards the left side, which sensation continued till her delivery. Her health was good, and she continued as active as ever. At this time (January) she consulted me, when I gave it as my opinion that her child was dead, and that she would be delivered of it on or before the completion of the nine months. She engaged me to attend her.

I heard nothing more of her till the 19th Aug. 1829, when, passing by her house, I was called in, and found her in great pain, like labour. An examination discovered it to be so; and, about

half an hour afterwards she was delivered of a male still-born child, followed soon after by the placenta. The child seemed to have died about the fifth or sixth month, which corresponds with her account. It measured, in length, between nine and ten inches; weighed six ounces; was much reduced, shrivelled, and emaciated; of the colour of tanned leather, without fetor or any disagreeable smell. I have it by me now, immersed in spirits. She is at this time (the 28th of August) doing well.

There is no reason to doubt the accuracy of this woman's statement, she being of good character, and all the circumstances of her condition well known to her neighbours. She fancied, after the month of January, that her pregnancy had gone off, and that all the symptoms which she had had were such as are customary to women at what they term the turn of life, or final cessation of the menses, of which she had seen none since her conception in July 1828; and was, therefore, rather surprised when I told her she was in labour. But her age being only 38, and the circumstance above detailed, preclude the idea of the "turn of life" with her.

I have submitted these facts without note or comment, as they occurred, but will be very glad to read your observations or those of your correspondents upon them. In the course of a long practice, I have neither seen nor heard of any such occurrence, nor do I remember reading it. It is a singular phenomenon, and very curious both in a physiological and pathological point of view.

I am, Sir,

Your obedient servant,

PETER CULLEN,
Surgeon.

Sheerness, Sept. 1, 1829.

OBSTINATE HÆMORRHAGE CAUSED BY DRAWING A TOOTH.

To the Editor of the London Medical Gazette.

SIR,

HAVING lately seen in the Edinburgh Medical and Surgical Journal, (vol. xii. p. 500, and vol. xiv. p. 379,) two cases of hæmorrhage after the extraction of teeth, which proved fatal in spite of all the means devised by the ablest surgeons, I am tempted to communicate

to you the result of my own practice in a similar case, which fortunately saved the life of my patient.

In the year 1801, I extracted a molar tooth from the upper jaw of a man about 30 years of age, and of sanguine temperament. Obstinate hæmorrhage followed the operation, and continued so profuse for three days, notwithstanding all the means that I had applied to check it, that the man fainted several times, and was evidently sinking fast.

Under these alarming circumstances it occurred to me that pressure accurately applied, afforded the best-grounded hope of stopping the flow of blood. I accordingly modelled a tooth in wax, exactly to the shape and size of that which I had extracted, introduced it into the socket which the natural one had occupied, and retained it there by firm pressure. The bleeding was immediately arrested, and the patient rapidly recovered.

I have since, on two or three occasions, adopted this simple, but effectual, method of arresting hæmorrhage caused by the drawing of a tooth, when ordinary remedies seemed likely to fail in producing the desired effect.

Should the above appear worthy of a place in your journal, it is at your disposal, whilst I remain,

Your very obedient servant,

J. CORTEZ, Surgeon.

Gibraltar, 26th June, 1829.

CLINICAL LECTURES.

To the Editor of the London Medical Gazette.

Birmingham.

SIR,

THE institution of clinical lectures at our hospital, and the interest thereby excited in this town, have naturally turned my attention to the comparative value of this mode of instruction; and I feel persuaded that of all the various means usually employed to convey medical knowledge, none is so well calculated to store the mind with practical precepts as that of clinical lectures. That this truth is generally acknowledged, may be inferred from the zeal manifested by students attending the *clinique* in all countries where this mode of instruction is adopted. In England,

however, but few opportunities of learning the opinions of the seniors of our profession in this most agreeable manner is afforded to the lovers of medical science; but those who have witnessed the rush of three or four hundred students into the clinical theatre of the Hotel Dieu, or those who have heard the excellent practical remarks of Baron Dupuytren after the morning visit, will be best able to appreciate and to attest their value. Doubtless the lectures which form a part of the prescribed course of study are highly useful, perhaps indispensable; but the difficulty, and often the impossibility of conveying by language an adequate idea of the progress of disease, and especially of morbid appearances, is a continual source of embarrassment both to teacher and student; and it not unfrequently happens that the student leaves a lecture-room little benefited by what he has heard in it, from a deficiency of that knowledge which he can alone obtain by actual observation at the bed-side of the patient. In clinical instruction, therefore, this deficiency is supplied, for the cases cited, if not actually in the lecture-room, are under the same roof; the mind is invited to reflect on the observations it had just received fresh from the senses, and any points which may have been imperfectly conceived are then rightly comprehended; or by making a second visit, erroneous impressions may be removed.

Another advantage of this mode of instruction is, that our anatomical, pathological, and physiological knowledge, are all exercised at the same time, mutually assisting to throw light on each other, and to establish a correct acquaintance with therapeutics. The young practitioner, on entering his professional career, has on these occasions an opportunity of studying various diseases, with which, perhaps, the limited extent of his own practice at first but rarely supplies him.

Again, those gentlemen who have full scope for the exercise of those attainments which the well-directed energy of their earlier years has enabled them to make, will find the attendance at the clinique a profitable employment; for we know that the impressions which medical science may have made on their minds, and which daily become fainter from disuse, will be here retouched, and will break again on the memory with

their pristine freshness. The business-like habits too which an extensive practice engenders in older minds, produces an apathy for science; and self-love soon intimates that the public confidence reposed in them is a sufficient proof of their superiority, and a valid reason for their relaxing their wonted exertions to keep pace with the daily improvements which science undergoes. These errors are best corrected by attending clinical lectures, where they become convinced that if they would maintain the reputation they enjoy, they must still pursue the means that first created it; in short, if we would hold our place in the rapid stream of science, we must, like the fish, constantly exert our strength to support us against its increasing power.

Led on by the delights which the variegated page of medical science presents to us as students, we are too often weaned from meditating on the grand purpose of our after years, viz. to become practically useful in alleviating human suffering. We forget, or rather we cannot conceive, that the world at large should prefer the practice to the fascinating theory of medicine, and should not value that which we estimate so highly. It may be vexatious to a young man who leaves town teeming with the richest cullings of botanical, chemical, and physiological sciences, to find, contrary to his anticipations, that he obtains no credit—no introduction to practice from these; his reputation alone of being able to *cure* disease, or to repair injuries, advances him in the eyes of the public. The auxiliary sciences, which afforded him so much pleasure in the acquirement, and so much satisfaction in the possession, are rated but very low in the scale of usefulness. To the young practitioner, who is tremblingly alive to the effects of every breeze that may visit too rudely his professional character, the public applause bestowed on men far beneath him in point of scientific research, is at first galling and unaccountable: he well remembers the vigils he has kept at the shrine of science, but he finds to his discomfiture that the public estimate him for these, not in proportion to his literary acquirements, but for his ability in arresting the destructive hand of disease. In fine, when he hopes successfully to have studied his profession, and by its aid to mount to distinction in society, he discovers that he has to begin

to study the world and all its caprices, and instead of taking possession of the broad avenue leading to fame, he has slowly to tread the thorny path to public estimation. If these things would tend to depress his hopes, it is at this crisis that he will find the value of clinical instruction, especially if he has not experienced it before. By this means his zoological, anatomical, and physiological acquirements will be re-awakened, and will recal those pleasures that their studies first imparted.

If practical information, then, be regarded as our sole claim to public patronage, clinical lectures are well calculated to supply it. Hence they are pleasing in themselves, and profitable in their effects; and, may we not add, happy is this country in having public charities to relieve the suffering poor so thickly scattered, and able men so numerous to turn the knowledge of disease consequent on the congregation of its miserable victims to universal good.

It is only by an early initiation of the student into a correct knowledge of the fundamental principles of medicine, that we can reasonably expect to find in the practitioner that superior intelligence on which the advancement of medicine depends. A reference to the history of all sciences in past ages will soon convince us of the value of systematic arrangement, or the necessity of proceeding upon just principles. The motions and relative positions of the stars had been sedulously observed for more than 5000 years before the time of Newton; but in all this time how little was accomplished in reality? Astronomers had ever been proceeding upon erroneous principles, so that their labours were lost to the ages in which they lived; all the real good they achieved was confined to the collection of materials which were only to be turned to advantage by future generations. The accelerated motions of projected bodies was probably known to the first man who threw a stone; yet of what use was this knowledge before the laws which governed motion were made known by Kepler? The important benefits conferred on science by the stupendous genius of Lord Bacon, consist much less in what he himself accomplished, than in what he enabled others to accomplish, by directing their minds into the only channel by which they

could make any considerable advancement in real knowledge.

The great superiority of Sir I. Newton over the star-gazers who had preceded him, arose from his being able to class their observations in a natural order, and to investigate the laws by which the motions of the celestial bodies were governed, rather than by any discovery of new facts. Most people had seen an apple fall, but no one had manifested the most distant idea that its fall was governed by the same laws by which the planets moved in their orbits.

The circulation of the blood certainly was suspected, and the pulmonary circulation had been described long before the time of Harvey; but till he demonstrated the manner in which its round was accomplished, what practical advantage did, or could result from it? The nervous system had been dissected with the most scrupulous exactitude—names had been given to every branch with a degree of fastidious detail, which served but to distract the pupil, and to make him despair of ever learning the anatomy of this complex system; but it remained for Mr. C. Bell to trace them to their origins—to demonstrate the natural division of them according to their functions—and in many other respects to add new interest to this agreeable study.

The anatomy of the brain, too, before the improved method of dissecting it by Dr. Spurzheim, was enveloped in equal obscurity. It had been sliced in every direction, and the sliced surfaces had been described according to their colour, form, &c. with geometrical accuracy; but of the functions of its different parts nothing was known—indeed it is plain no useful results from such a method could accrue; but by the unwearied exertions of Dr. S. during an ordinary life-time—exertions based on a few sure data, we at last begin to form clearer notions of its complicated functions.

Without adducing further analogy to shew the advantages of a systematic or scientific mode of studying medicine, it must be obvious even to those who have paid but little attention to the history of our profession, that it is not merely witnessing accidents or diseases that can ever make the accomplished physician or surgeon, or can ever tend to perfect medical science. Medicine owes so

much to the sister sciences, that its improvements will ever bear a just relation to their progression and declension, and he will make little advance towards the modern perfection of medicine who, neglecting their aid, trusts to his own observation for his sum of knowledge. Nothing is more wanted to guide the medical student than a condensed accumulation of facts and opinions, gleaned from those practical authors who are best acquainted with the treatment of disease in all its shapes; and nothing can more effectually supply this than clinical lectures. Had clinical instruction, for instance, been sooner instituted at our hospital, we should probably have turned to account much valuable practical information, which is now lost to us with the loss of its former possessors. Had a volume of hospital reports been annually published, on the same plan as those of Dublin, ere this fifty such volumes might have been in existence, and would have been highly valuable to all those engaged in the cultivation of medical science. We feel persuaded that such a work would at once have found its way into all the public medical libraries in this kingdom, and also abroad, wherever the superiority of the English method of managing disease is duly appreciated; nor is it easy to calculate how great an influence a thing so trifling comparatively in its achievement would have had on the practice of the profession in the neighbourhood of this hospital. In a populous district like the one we are now considering, much deference is paid by the faculty generally to the established opinions which guide or characterise the practice of a general hospital; and when this is considered, it will be accounted an additional reason for the publication of the success or failure in the treatment of diseases in these institutions. Few, if any, provincial hospitals have been more fertile in remarkable cases than the Birmingham Hospital, and surely none has turned them to less account. In giving this opinion, it might seem that we would charge the gentlemen connected with this admirable charity with not having done their duty, in endeavouring to place the results of their practice in that channel, where it might benefit the rising members of the profession: we would not wish any one to draw such conclusions. The public have hitherto thought it sufficient to provide

for the relief of the objects of their benevolence, and have rarely thought of making hospitals conservatories of science, and consequently, objects of national importance. But if we are not greatly deceived, the time is not very distant when the extensive diffusion of knowledge among all classes of society will lead them to expect on the part of the medical officers of establishments for the treatment of disease, not only the ability, but the disposition, to foster the science they profess, by aiding, by every means in their power, the early initiation of pupils into its fundamental principles.

Since the institution of clinical lectures here last season, the study of surgery has received an additional charm, which cannot fail to render it more estimable to the profession, and more valuable to the public, as it will become a more effectual agent in alleviating human distress. Yours; &c. B.

ANALYSES OF BRITISH MEDICAL JOURNALS.

PROVINCIAL MEDICAL GAZETTE.

No. II. July, 1829.

Lectures on the Physical Signs of Diseases of the Chest, delivered before the Members of the Portsmouth Philosophical Society in Jan. 1829. By JOHN FORBES, M.D. F.R.S. Senior Physician of the Chichester Infirmary.

THE lecture is interesting and well written, but on too popular a plan for our pages.

Cases of Sciatica and of Paraplegia following Apoplexy, successfully treated by Mr. PURCELL, M.R.C.S.

CASE I.—This was a case of obstinate sciatica in a young man, apparently from exposure to cold and wet. Cupping, bleeding, warm bath, and carbonate of iron in large doses, were employed without the least relief. Acupuncture was then tried, which produced temporary, and but temporary mitigation of the pain. Moxas were next applied to the extent of producing an eschar, and this was repeated daily for four days, at the end of which time he was well.

CASE II.—A robust man, aged 25,

had an apoplectic seizure on the 8th of August, from which he recovered under the use of the usual means.

“ Aug. 16.—Notwithstanding the depletion, both generally and locally, he has undergone, he complained this morning of a numbness and loss of power in his left side: he was again cupped on the left hypochondrium, with the most decided benefit, the sensibility of the part having returned, and the sensation of numbness being removed; but on the following day he complained of a numbness, accompanied with a tingling in his lower extremities, and partially so in the upper extremities, which were much relieved by cupping and blistering; but during the night the tingling sensations in his lower extremities increased, preventing his sleeping, and, upon attempting to turn himself in bed, he found he had lost the power of moving his legs. Upon an inquiry into his symptoms, he said he felt a degree of pain, which he described to be in the situation of the origin of the lumbar and crural nerves: his limbs are partially sensible when pinched; pulse 96, rather full; bowels have been freely open for some days by medicine; system under the influence of mercury. He was again cupped on the loins, followed by the application of a blister.”

He rapidly improved as to his general health under the use of various remedies; but continued, up to 17th Sept., without any power of the lower extremities. Two moxas were then applied to the loins, in the situation of the transverse processes of the lumbar vertebræ, every other day, to the extent of producing redness of the surrounding skin; and a quarter of a grain of extract of *nux vomica* (prepared in vacuo) given every six hours; and half a grain of sulphate of quina three times a day. The dose of the *nux vomica* was gradually increased, and by the 14th of October he was taking six grains of the extract every six hours. The moxas were also regularly repeated, and, under the combined influence of the two, he “ entirely regained the use of his limbs.”

Case of Carditis, with remarks. By Mr. CORBIN, M.R.C.S. and House Surgeon to the Winchester Hospital.

The case was treated by bleeding to syncope. On the supervention of the

last attack, blistering and colchicum. The most remarkable circumstance is, that a repetition of the bleeding having been deemed requisite, it was postponed because “ the catamenia were at that time flowing freely.” Does the presence of the menses form a sufficient contra-indication to bleeding in any acute disease?

The next article is a list of rare plants growing in Hampshire, with the places where they are found. Of course a paper of *local* interest.

After this follows a paper in favour of Phrenology, signed “ Vindex.” It contains no new arguments in favour of that doctrine.

Operations for Cataract and Artificial Pupil. By Mr. J. W. WILLIAMS, M.R.C.S. London, and Surgeon of the South Hants and Portsmouth Eye and Ear Infirmary.

The first case detailed is that of a widow lady, in her 80th year, blind for seven years with cataract of both eyes. The operation of depression, with rupture of the capsule, was performed first on the left eye, and after some time on the right. The vision of both was restored.

The second patient was a medical gentleman, nearly 80 years old, who had cataract of the left eye, and gradually increasing opacity of the lens on the right side. The cataract was “ broken up,” and left freely exposed to the action of the aqueous humour, by which means vision was perfectly restored, the opacity of the right eye gradually diminishing from the time the operation was performed.

In a case of congenital cataract in a child 18 months old, the following method was adopted:—

“ Saunders’s needle was introduced behind the cornea, and as soon as it was made to rend the capsule, a milky fluid issued, having the appearance of white vapour. When the laceration was judged sufficient, the instrument was withdrawn, and the eye-lids allowed to close, being kept cold with a compress soaked in water. As is usual in these infantile cases, no inflammation ensued. I was mortified to find in the sequel, that the posterior layer of the capsule had approximated to the front part of it, and filled up the rent. After a fortnight,

this puncture was repeated; and although an aperture was made to the satisfaction of all present, the result, in a few days, was the same. Thus foiled in relieving the child by means of the posterior operation, or, as the French surgeons call it, *sclerofixis*, I resolved on attempting the right eye by the anterior operation, or that through the cornea. This was accomplished with great facility, and a good aperture was made in the crystalline sacculæ; when, finding the aqueous humour leaking by the sides of the needle, I withdrew it for fear of injuring the iris. The child recovered equally well from this as from the other operations, and the result is, that he is now enabled to communicate with the world by the most interesting of the senses, and sees the smallest objects very plainly."

Mr. Williams intends operating on the other eye by the anterior mode.

A case of artificial pupil required by iritis is next detailed—it was but partially successful.

A Case of Strangulated Hernia, with Adhesions to the Sac. By JOHN VALENTINE, M.R.C.S. London.

The patient was 72 years of age, and had had scrotal hernia for forty years, which had now been strangulated for two days, and the usual means having been tried for half an hour without success, the operation was performed. A considerable quantity of omentum and mesentery were found in the sac, universally adherent to it. The stricture was divided, and the bowel easily reduced, but the omentum was left *in situ*. The patient did well.

Dislocation of the Radius.

Two instances of this, which have been admitted at the Winchester County Hospital, are communicated by Mr. Case.

As dislocation of the radius backwards without the ulna is of rare occurrence, we subjoin the following examples of it:—

CASE I.

"William Smith, ætat. 14, was admitted in the month of November 1828, on account of a disease of the tibia. On examination of his right elbow, a dislocation of the radius from the ulna was

discovered, which, it appeared, had been treated for an abscess, there being on each side of the head of the bone, a cicatrix of some extent. The injury took place when the patient was an infant; he, therefore, can give no account of it. The appearances which presented themselves were as follow:—The elbow was very much deformed, the head of the radius being thrown upon the external condyle of the humerus, making a large projection there; he is unable to make perfect flexion or extension of the fore-arm upon the humerus; neither is it in his power to perform the actions of pronation and supination, as there is not the least rotatory motion of the radius; and, when requested to turn his hand upwards and downwards, the whole motion is performed by the shoulder-joint.

CASE II.

John Hewstead, ætat. 21, was admitted on the 1st of April, 1829, with an eruption, extending over the greater part of his body. On exposing his left arm, great deformity of the elbow-joint was observed. He gives the following account of its origin:—About thirteen years ago, whilst playing at cricket, he struck the end of the bat against the ground, which accident caused immediately the present unshapely appearance of the joint. Nothing was done for him at this time, the surgeon to whom he applied not being acquainted with the nature of the injury.

At the time of the accident, he was able to bend the arm in a slight degree, but that motion has now ceased.

In the year 1826, an abscess formed about the joint, which was opened. Blisters were applied at the same time, but without any relief.

On examination, it proved to be a dislocation of the radius, rather laterally and backwards, the head being thrown upon the humerus between its articulating surface, and the extreme point of the external condyle. Perfect ankylosis of the joint has taken place, leaving the arm in the semiflexed position, without the least degree of motion in any direction whatever.

We pass by some observations on "The Old and the New School of Medicine," as well as "An Abstract of a Popular Lecture on Animal and Vegetable Poisons," by Dr. Lempriere, nei-

ther falling within the scope of our analysis.

Medical Reform.

This brings us to the leading article on "Medical Reform," which contains some pertinent observations on the present state of the profession, written in a spirit alike alien to the levelling system of the radicals and the bigoted stubbornness of the few who think that there is no part of our medical polity which admits of improvement. "In the ranks (says the writer) of the more moderate, but not on that account the less strenuous, reformers, we desire to be classed." One of the points discussed is, the degree of protection which the legislature ought to afford the public against incompetent practitioners in medicine. We entirely concur in the sentiments conveyed in the following passage:—

"We are aware that there are certain professions in which the public are left with sufficient safety, and, perhaps, advantage, to judge for themselves of the talents of those who are engaged in them. The access to the English bar, for example, consists entirely in matters of mere form. There is no security afforded, that the members of it have either obtained a liberal general education, or that they have taken any care to furnish themselves with legal knowledge; yet the system answers well; and there is no *forum* in the world more distinguished for talents—none where true talent is more certain to succeed, or where it is so exclusively the source of success. We admit, therefore, that we should not be greatly surprised, if persons, unacquainted with our art, were to suppose that the public might, with equal advantage, be left to judge for itself of the skill of practitioners in medicine; but that those who are aware what a perfect mystery the whole science is to the multitude, and how grossly and easily they are deceived, even with all the safe-guards they possess—that any honest and enlightened member of our own body should advocate a system so pregnant with danger, is scarcely to be credited. Ignorance itself might prevent the public from perceiving their own inability to judge in such matters; but impudence and charlatanry alone would attempt to blind them to their incapacity for doing so. Notwithstanding the securities they en-

joy from the admission of incompetent persons into the profession, their judgment is sufficiently tasked in weighing the comparative merits of the duly-educated practitioners. We will venture to say, indeed, that there is not a sensible man among us who has not laughed a thousand times at their verdict; that is to say, if his own personal disappointment or disgust have not unfitted him from deriving amusement from it. It must be admitted, it is true, that their opinion of us all is, in general, sufficiently favourable. Real talents may, perhaps, be occasionally overlooked; but, for one case of that kind, we think we could produce a hundred where men have been looked up to as prodigies of cleverness, who, had they entered a profession in which the public could form any sound judgment of their capacity, would have been denounced as the most egregious dunces. It is unnecessary to dilate upon the subject: perhaps, without saying so much, we might have assumed the impropriety of leaving our profession unrestrictedly open to every adventurer who should choose to dub himself with the name of doctor. It may be impossible, indeed, entirely to prevent our bull-headed countrymen from being imposed upon. So great is their spirit of *freedom*, forsooth, that they *will* not be restrained from running their heads against a wall, or doing any other absurd thing, if they have a mind to do it. We confess, for our own part, we should feel greatly inclined to lay their obstinacy under control in this respect, and render it lawful to grant a statute of lunacy against any person, on the simple ground of his having followed the advice of an empiric! At all events, we are of opinion that the penalty against the impostor himself could hardly be too severe."

We also agree with what is said respecting the subdivisions of the profession:—

"In most other occupations the division of labour has been found of incalculable utility, and the necessities of a growing and intelligent population have occasioned its universal adoption. In medicine itself, this subdivision has extended itself of late years greatly. Hence the introduction into the profession of exclusive accoucheurs, oculists, aurists, dentists, cuppers, corn-cutters, &c. Now, though the necessity and utility of some of these may well be

questioned, we are not among those who would advocate their suppression ; or, who would impose the obligation to practise every branch of the profession upon those who enter its pale. It is plausibly enough contended, to be sure, that, as every branch of the science of healing is founded upon the same knowledge of the human frame, its structure and functions, and, as our diseases are so apt to run into, and produce each other, no safe or proper line of division can be drawn, in endeavouring to perfect our art, by diminishing the field of the practitioner's exertions. We readily admit that this would be a most valid objection to the exclusive practice of any one branch of the profession, by such as are totally ignorant of the other branches. But there can be few, if any, cases of this kind. None, indeed, without the culpable neglect of those guardians who have been appointed for the public safety. The objection, however, does not appear to us of sufficient force when used as an argument against the exclusive practice of a particular branch of medicine, by men who have previously obtained a proper scientific knowledge of the art in general. We do not attempt to say how far this subdivision may, with safety or advantage, be carried ; but the benefits of adopting it in some degree are so evident, that we feel no surprise at its extension beyond what are, perhaps, the actual wants of the public. If we be right in this view of the subject, we shall have no hesitation in dissenting from those who advocate the abolition of that grand division of the profession into physicians, surgeons, and apothecaries, which has so long subsisted. The practice of the physician and the surgeon must frequently, we admit, pass into each other ; but still there is a division between them sufficiently marked and sufficiently important for practical purposes ; and the advantages of separating them, for the sake of their several advancement and perfection, are so palpable, that, wherever there is a field sufficient for their support, they will continue to be prosecuted distinctly from each other. Where the field is too contracted, and the means insufficient to maintain this division, the different branches of the profession must of necessity be united in practice, as in that of the third class

of English practitioners, who, though in times past they were, in reality, only compounders of drugs, have become the sole physicians and surgeons, as well as apothecaries, of the great bulk of the community.

“ As these subdivisions of the profession have been hitherto acknowledged by the legislature, separate tribunals are established for licensing persons to practise in them. But since we have admitted the propriety of every practitioner, in whatever branch, being duly instructed in the whole science of medicine, it may be expected that we should recommend the establishment of *one* tribunal only for granting such licenses—the candidates being left to choose afterwards in what department they shall practise. It would evidently, however, be a matter of perfect indifference, whether the tribunals were united or separate, if the tests submitted to were precisely the same. On the other hand, if (as is, in our opinion, wisely the case,) by being separate, their efforts be directed to ascertaining the candidate's peculiar fitness for that branch which he intends to prosecute, at the same time that his acquaintance with the science in general is put to the proof, a great additional advantage is insured.”

[To be concluded in our next.]

ANALYSES & NOTICES OF BOOKS.

“ L'Auteur se tue à alonger ce que le lecteur se tue à abrégér.”—D'ALEMBERT.

On a Morbid Affection of Infancy, arising from circumstances of Exhaustion, but resembling Hydrencephalus. By MARSHALL HALL, M.D. F.R.S.E. &c. &c. 1829.

CONSIDERABLE attention has lately been excited towards a morbid condition incident to infancy, resembling hydrocephalus in many of its symptoms, but essentially differing in the treatment it requires. We very recently gave, at some length, the observations of Dr. Gooch on this subject ; in the course of which, it will be remembered, he adverted to the opinions of Dr. M.

Hall. This gentleman has himself stated these more explicitly in a little essay now before us, from which we shall make such extracts as are necessary to put them fully in possession of his views on this interesting and highly important practical question.

“The diseases of children best understood, are those which arise from irritation, and principally irritation in the stomach and bowels, and the irritation of teething, and inflammation. But there is another source of disorder in infancy, less frequent perhaps in its operation, but not less important in its consequences, and far less understood by medical men, in exhaustion. This exhaustion has its origin in early infancy, chiefly in diarrhœa or catharsis; in the later periods of infancy, in the loss of blood, with or without the relaxed or evacuated condition of the bowels.

“The state of diarrhœa has generally depended upon improper food. It has very frequently succeeded to weaning, or to other changes in the diet. The catharsis has followed the administration of an aperient medicine, which, at such a moment of disorder of the stomach and bowels, is apt to act excessively. The exhaustion from loss of blood generally follows the inappropriate or undue application of leeches or use of the lancet.

“I may observe, indeed, in this place, that of the whole number of fatal cases of disease in infancy, a great proportion occur from this inappropriate or undue application of exhausting remedies. This observation may have a salutary effect in checking the ardour of many young practitioners, who are apt to think that if they have only bled, and purged, and given calomel enough, they have done their duty; when, in fact, in subduing a former, they have excited a new disease, which they have not understood, and which has led to the fatal result.

“This question, and that of the effects of exhaustion in infants and children, open a new field for investigation. Almost all our works on infantile diseases are silent on the subject; and yet without an accurate knowledge of it, I regard it as totally impossible that we should be prepared to watch and treat the morbid affections of this young and tender age. The subject must be taken up and investigated anew. All the affections which may

arise from exhaustion, must be accurately observed, distinguished from similar affections arising from other causes, and traced back to their origin, and forward in relation to their remedies. In this manner some hydrocephaloid, convulsive, and even eroupy affections will be viewed in a new aspect; and we shall be preserved from some painful dilemmas into which we should assuredly fall without this knowledge of the effects of exhaustion.

“But in this essay I purpose to confine my observations to one of the forms of disorder which arise from this cause,—the hydrocephaloid. It may be divided into two stages, the first that of irritability, the second that of torpor; in the former there appears to be a feeble attempt at re-action, in the latter the nervous powers appear to be more prostrate. These two stages resemble, in many of their symptoms, the first and second stages of hydrocephalus respectively.

“This morbid affection has, as I have stated, usually been first induced by some change in the diet, by which the stomach has been loaded or disordered, and the bowels perhaps affected with diarrhœa; and this latter state has frequently been exasperated by the untimely administration of an aperient medicine. The infant becomes irritable, restless, and feverish; the face flushed, the surface hot, and the pulse frequent; there is an undue sensitiveness of the nerves of feeling, and the little patient starts on being touched, or from any sudden noise; there are sighing, moaning during the sleep, and screaming; the bowels are flatulent and loose, and the evacuations are mucous and disordered.

“If, through an erroneous notion as to the nature of this affection, nourishment and cordials be not given; or if the diarrhœa continue, either spontaneously, or from the administration of medicine, the exhaustion which ensues is apt to lead to a very different train of symptoms. The countenance becomes pale, and the cheeks cool or cold; the eye-lids are half closed, the eyes are unfixed, and unattracted by any object placed before them, the pupils unmoved on the approach of light; the breathing, from being quick, becomes irregular and affected by sighs; the voice becomes husky, and there is sometimes a husky teasing cough; and, eventually,

if the strength of the little patient continue to decline, there is crepitus or rattling in the breathing; the evacuations are usually green; the feet are apt to be cold.

“A similar train of symptoms occurs in other cases, in which the strength of the little patient has been subdued, and the vascular system exhausted by the abstraction of blood. In both cases leeches are sometimes again applied to subdue this new form of disease, under the erroneous notion of a primary cerebral affection. This measure infallibly plunges the little patient into imminent, if not irretrievable danger.

“Sometimes the sinking state goes on in spite of every appropriate remedy.

“Stimuli, if efficacious, reduce the frequency of the pulse, and restore the wonted warmth, colour, expression, and smiles to the countenance.

“The condition of the cheeks, in regard to colour and warmth, may be considered as the pulse of very young infants, indicating the degree of remaining power, or of exhaustion. In the present case especially, there is no symptom so important, so distinctive. It is from the condition of the cheeks, in conjunction with a due consideration of the history, that the diagnosis of this morbid state, and the indication of the appropriate remedies, are chiefly to be deduced. The general surface, and especially the hands and feet, also afford important sources of information as to the condition of the nervous or vital powers. Next to these, the degree of frequency of the pulse, and the character of the breathing, are points of the greatest importance;—during the stage of irritability the breathing is quick; during that of torpor, it is slower, irregular, suspirious, and finally crepitous; the pulse changes in its beat, from being full becoming smaller, but retaining, perhaps, its former frequency.

“We should be especially upon our guard not to mistake the stupor or coma, into which the state of irritability is apt to subside, for the natural sleep, and for an indication of returning health. The pallor and coldness of the cheeks, the half-closed eye-lid, and the irregular breathing, will sufficiently distinguish the two cases. It is equally important to distinguish this state from a hydrocephaloid affection arising from derangement of the alimentary

canal, and from the coma of hydrocephalus itself. This is to be done chiefly by observing the condition of the countenance and by tracing the history and causes of the affection. There is an absence of the heat and occasional restlessness and irritability in the former of these affections, and of the contracted brow, and of the expression of pain on moving the head, observed in the latter.”

The author then quotes some passages from his “Medical Essays,” from Dr. Abercrombie’s “Researches,” and from Dr. Gooch’s late work, which, however, we pass by, as already before our readers.

The remedies adopted by Dr. Marshall Hall “are such as will check the diarrhoea, and afterwards regulate the bowels, and restore and sustain the strength of the little patient. With the first objects it may be necessary to give the tinctura opii, and chalk, and afterwards the pilula hydrargyri, rhubarb, and magnesia; with the second, sal volatile, but especially brandy, and proper nourishment are to be given according to circumstances. But, in this, as in so many cases of infantile disorders, the milk of a young and healthy nurse, is the remedy of most importance,—in the absence of which, ass’s milk may be tried, but certainly not with the same confident hope of benefit.

“Five or ten drops of the sal volatile may be given every three or four hours; and twice or thrice in the interval, five or ten drops of brandy may be given in arrow-root done in water. As the diarrhoea and the appearances of exhaustion subside, these remedies are to be subtracted; the bowels are to be watched and regulated, and the strength is to be continually sustained by the nurse’s or ass’s milk. The brandy has sometimes appeared to induce pain; sal volatile is then to be substituted for it; a dose of magnesia has also appeared to do good.

“For the state of irritability, the warm bath is a remedy of great efficacy. For the coma a small blister or sinapism should be applied to the nape of the neck. A state of exhaustion of the general system, as I have observed elsewhere*, by no means precludes the possibility of real congestion of the brain. It rather implies it. In extreme

* Commentaries on Diseases of Females, *passim*.

cases these are not only the symptoms of cerebral congestion during life, but effusion of serum into the ventricles of the brain is found on examination after death.

“ In every ease the extremities are to be kept warm by flannel, and the circulation should be promoted in them by assiduous frictions. It is of the utmost importance carefully to avoid putting the little patient into the erect posture. A free current of air is also a restorative of the greatest efficacy.”

MEDICAL GAZETTE.

Saturday, Sept. 19, 1829.

“ Licet omnibus, licet etiam mihi, dignitatem *Artis Medicæ* tueri; potestas modo veniendi in publicum sit, dicendi periculum non recuso.”—CICERO.

ATTACKS ON *PRIVATE* CHARACTER AND *PUBLIC* INSTITUTIONS.

AT the close of our observations on this subject last week, we alluded to the gross absurdity of any one who has marked the commencement and progress of the *Lancet* believing for a moment that the constant attacks which it contains on the medical institutions of this country originate in public motives. The hospitals have been denounced as slaughter-houses, and their officers persecuted with unrelenting hatred, from the moment that Wakley was turned out of St. Thomas's for publishing false reports; and it is a fact not more remarkable than it is notorious, that there exists not a man in the profession who has been less within the walls of our hospitals than he who has spent his life in abusing them. In what hospital in London, we ask, *dare he shew his face?**

* We except the Middlesex, where his official situation of Churchwarden of the Parish gives him a temporary right of admission: perhaps we ought also to except the Royal Western Hospital, so called.

His attacks on those institutions which constitute monuments of public and individual munificence, and which are objects well deserving the national pride with which they are regarded, have justly been looked upon as the ebullitions of a vindictive mind, stimulated by a love of gain. At length has the Editor of the *Lancet* opened his eyes to the truth of this, which we have often pointed out to him; and, in his eagerness to redeem the error, forgets to give his recantation the decency it might have acquired from being gradual; but, with matchless intrepidity, swears that he has always been a friend to hospitals. “ *We have been ALWAYS too much impressed* (says he) *with a knowledge of the blessings which our hospitals hold out to a suffering and impoverished people to desire their downfall, or the least diminution of their resources!!!*”

It would have been impossible for any other to have given the lie to his former calumnies so effectually as he has here done himself; and we shall merely allude in addition to the falsehood by which he attempts to gloss over so monstrous an assertion. It is that the numberless abusive articles he has written with regard to medical charities apply not to hospitals, but to infirmaries and dispensaries; and although, up to a very recent period, *HOSPITALS* alone were spoken of, yet now he very coolly tells us that he never has been unfriendly to the latter, and that it is only the former he wishes to destroy. “ We allude, of course (says he) to those pest-houses and puff-shops—infirmaries and dispensaries.” Now this, with the former boast of the frequency with which he had held up the “major slaughter-houses” to execration staring his readers in the face, must be acknowledged to be sufficiently intrepid. But this is not all: for we take upon ourselves to say, that from the outset of the

Lancet's respectable career—from the period at which the Editor collected and published, for the advancement of science and instruction of youth, the indecent depositions regarding a preacher at Peckham, down to June of the present year, the abuse is almost exclusively directed against hospitals, without any direct attacks upon dispensaries; and the reason for introducing the subject then, was that the editor sought to gratify his malice against certain medical officers connected with some of these institutions.

With this clue to the morality and public spirit which in this, as in every other instance, has governed the Lancet, there can be no difficulty in explaining the motives of an attack which has recently been made upon the Asylum for the Recovery of Health at Lisson Grove. We are not sorry, however, that he has thus given us an opportunity of laying an account of that excellent institution before our readers. For this purpose we shall quote the entire extract, taken by the Lancet from the explanation of the plan of the institution, *published by the governors at the time of its establishment in 1820*. After alluding to the advantages derived by the public from the existence of *Maisons de Santé* on the continent, it is added—

“ In this country, also, there are no doubt many, who, from a sense of delicacy acquired from a good education, and the habits of better days, or from honest feelings of British independence, would be averse from going into hospitals, and would rather submit to the effects of severe disease, and to want of needful aid and attendance at home. Should the pressure of afflicting maladies, in some few instances, even overcome that repugnance, the individuals must enter into such an establishment with a broken spirit, and a feeling of degradation that would have a tendency to retard, if not altogether frustrate, every hope of recovery. Females living on narrow incomes without domestic

connexions, and well-educated persons reduced by the casualties of life, would find in such an establishment a welcome retreat, where not only disease might be combated, but anxious solicitude and separation from friends soothed and consoled by that kind attention and prompt and various succour which the unfortunate sufferers could have no chance of obtaining at their own dwellings. It is also presumed, that the sick members of the families of many respectable artisans and mechanics, clerks on small salaries, apprentices, domestics of the higher class and of irreproachable character, would be often glad to avail themselves of such a resource; and the members of friendly and benevolent societies would find it the most eligible mode of laying out that money to which, during the period of their sickness, they are entitled. For besides lodging and diet, they would have the benefit of experienced nurses, resident medical officers, a store of medicines purchased and made up under the inspection of responsible persons, and directed by the advice of men whose high and established character must create a just confidence in their exertions.”

The building itself, and the regulations, are thus described :—

“ It is a building divided into two separate houses, with separate gardens for the two sexes. Patients having subscribers' letters are admitted on Thursdays by the Weekly Board, which meets at one o'clock. The payments at present required of patients are—of females, fourteen shillings; of males, seventeen shillings and sixpence; of children, ten shillings and sixpence each. Persons of either sex having separate rooms, pay one pound four shillings and sixpence per week. The governors have been compelled, for the sake of preserving the necessary separation, to adopt a regulation, that such servants only be admitted who shall pay for and occupy separate rooms. No servants in livery can be admitted.”

“ The public will be able to judge of the description of persons who have been relieved by this charity, when it is stated that several officers of the army and navy have been admitted, labouring under diseases brought on in the discharge of their duty; the wives and widows of officers, their children, and

those of the clergy, governesses, clerks, teachers, small tradesmen, women subsisting on small annuities, persons deriving sick allowances from benefit societies, and foreigners, both in civil and military life. Surgical operations of great importance have been performed with success, which the surgeons would have hesitated to have undertaken in the crowded wards, and unquiet circumstances of a public hospital, or with the deficient attendance and accommodations to be procured in the private dwellings of the patients."

After quoting this account, the Editor of the *Lancet* triumphantly inquires, "is not this, without exception, one of the most barefaced and impudent humbugs that ever was foisted upon the public?" The reasons which he assigns for putting this beyond doubt are two; first, that one of the physicians to this institution is Dr. Macleod, who obtained a verdict against him in the Court of King's Bench for slander; and, secondly, that the "*Asylum*" is calculated to injure the interests of the medical profession, by subtracting from the sum of business what would otherwise fall into the hands of general practitioners.

We shall confine our observations at present to the second point;—and we would remark that heretofore, when any discussion took place in the *Lancet* with regard to medical institutions, we always had the interests of the *patients* and the *public* descanted upon; but on the present occasion these are entirely laid aside; and the propriety of attending to the wants of a class of the community, acknowledged and provided for in other countries, is utterly disclaimed. That the public are gainers by the institution, cannot be disputed; it is obvious to reason, and confirmed by experience. But no matter: the Editor of the *Lancet*, judging from his own standard of morality, hopes to conciliate general practitioners, (and heaven knows he had need conciliate somebody), by sug-

gesting that *their* pecuniary interest are injured by such an establishment.

The argument is plausible, but utterly fallacious, and for the sake of the general practitioner, we heartily wish that the Institution was on a more extensive scale. The individuals admitted into the *Asylum for the Recovery of Health*, are from that class of society from which of all others the general practitioner suffers the heaviest loss. They are persons, not who *are*, but most of whom *have been*, in good circumstances: who are just able to subsist, but cannot meet the expense attendant on sickness, yet who often expect at the hands of the practitioner all the attendance and consideration which they have been accustomed to in their better days, and who too frequently run up bills with their apothecary which they are unable to discharge. Such, for example, are subaltern officers, who have to support a wife and family on half pay; clergymen without any cure; clerks with the superannuated allowance of ill health; and teachers out of employment, without any allowance at all. Where, we ask, is there to be found amid the many objects of commiseration in this great metropolis, a more utterly helpless being than a governess obliged by illness to leave her situation? or an unfortunate and ruined exile, driven to seek refuge among us by the political disturbances of his country? Such are the patients whose loss is held up as an irreparable injury to the profession—such are the sources whence Mr. Wakley would direct a current of wealth upon the general practitioner!

We should blush for any man, even among the least successful of our brethren, who did not spurn the imputation of such cupidity as the Editor of the *Lancet* has not hesitated to cast upon him. But turning from principles to facts, we may observe that the appli-

cation of general practitioners in behalf of persons attended by them under the circumstances alluded to, is one of the most frequent sources whence patients are admitted into the Asylum, shewing the light in which it is viewed by those acquainted with its objects. We do not deny the possibility of an individual who could afford to pay for attendance at home, gaining admission by misrepresenting his circumstances, for this has occurred, even at public hospitals; but we know that great care is taken to avoid this, and we know also,—and it is a strong argument in favour of the institution,—that Wakley, with all his desire to do so, has not been able to discover a single solitary instance of abuse, to give a pretext for his scurrility.

We have now disposed of all the arguments by which the Editor of the *Lancet* endeavours to justify his attack upon the Asylum, except that conveyed in his abuse of one of the Physicians—abuse poured forth in language significantly illustrative of the class of society with which the writer is chiefly conversant, of which society we rejoice to feel satisfied that *gentlemen* form no part. Thus:—

“What, we ask, must be the effect of such a system as this upon the interests of medical men? And yet the fellow, this dirty DUB, this contemptible scribbling Scotch DUB, who occupies the respectable office of physician in this *charity*, has had the impudence to taunt us on more than one occasion, with directing our observations to the pecuniary interests of medical practitioners! This is a subject upon which *he* may well quake. The profession has now before it, the true character of, at least, one of its *supporters*. Here we shall quit the subject for the present, as we are heartily sick of the impostor, and the humbug with which he is connected.”!

When a physician, who has long been engaged in the practice of his profes-

sion, is thus denounced by a public journalist as *an impostor*, and when such charge is unsupported by a shadow of proof, nothing can be more natural than to turn from the accusation to the accuser, and to inquire how far he is qualified to give or to withhold professional reputation. But when we consult the records of medicine, to search for the contributions to science made by him who thus has constituted himself arbitrator of the professional character of others, we find them silent on his merits;—when we visit our medical institutions to discover with which of them he is connected, we learn that the doors of all are shut against him;—when we inquire of other professional men as to his private practice, we meet with none who ever heard of it. There remains open to us but one source whence we can judge of the scale of his business, and the extent of his professional opportunities. These particulars are contained in the account of an action which Mr. Wakley, some years ago, brought against the Hope Insurance Company, to recover a sum of money for loss sustained by the burning of his house. The dispute between the parties did not necessarily involve an inquiry into the extent of Wakley's practice, but led to it in this way. The burning of his house was not one of those conflagrations in which a variety of causes might have led to the catastrophe, but was the result of arson. The plaintiff contended that the crime had been committed by an unknown assassin, whom he believed to have been instigated by malice against him, in consequence of a report that he was the person employed to cut off the heads of Thistlewood and his associates:—the defence was, that Wakley himself had been the incendiary. As the perpetrator of the arson was then, and indeed remains to this hour, undetected and

unpunished, it became necessary for the plaintiff's counsel to rebut the imputation thus cast upon his client, and among other circumstances, he asserted that Wakley was in extensive practice, and, therefore, could have had no motive for the commission of the crime. This statement, which was supported by no proof, led to an investigation by the other party as to its accuracy, and evidence was adduced by them which went to shew, that he had little or no practice, it being deposed on oath, by an apothecary, who undertook, in Wakley's absence, to attend to all his business, except midwifery, that during "about ten days" only one patient required his assistance—"a decent woman lodging in Avery-Row*". The circumstances thus brought to light during this memorable trial, must never be forgotten, when Wakley presumes to attack the professional character of any one, because they afford abundant materials to show the limited scale of his experience, and to destroy his credibility. When, therefore, a man constitutes himself the censor of a whole profession, and spends his life in slandering his brethren, does he not invite all who value our common honour, to turn upon the calumniator, and, pointing to the circumstances above detailed, to demand—WHO IS THE IMPOSTOR?

POISONING BY OPIUM.

THE case to which we alluded last week has been allowed to remain in the same obscurity which before involved it. That the deceased was not poisoned in consequence of the ignorance or carelessness of her medical attendants, is quite obvious from the statement which we published last week. It has been objected (Times of Tuesday) that the presence of opium in the bottle which

had contained the mixture was not ascertained by *chemical analysis*; but the writer cannot be aware of the readiness with which the presence of so large a proportion of laudanum in any such mixture may be detected by the smell and taste; besides which, the mixture has been subjected to chemical analysis. Independent of this, however, the facts which we formerly pointed out—namely, that the patient had taken with impunity three table-spoonsful of the medicine on Thursday night, and the same quantity twice on Friday, and that she went out afterwards to take an airing—are quite sufficient to prove that, however she came by her death, it could not have been from any poison "medicinally" administered, as stated in the verdict of the Jury.

We have to apologise for various typographical errors* in Dr. Tweedie's prescription: they arose from it not being received till the sheet was about to be struck off, in consequence of which it was of necessity printed without our seeing a proof. We thought it an act of justice to remove, without any delay, the imputation left by the inquest on more than one member of the profession.

DEATH OF MRS. DENMARK.

MRS. DENMARK, on whom Mr. Wardrop operated some time ago for supposed aneurism of the subclavian artery, and whose name has since been so often mentioned in various medical journals, died last week. The surgeon, by whom the deceased had originally been attended, and who subsequently had frequently visited her, was naturally anxious to be present at the post mortem examination; and after some unex-

* See Times, June 22, 1821.

* These are almost too obvious to require to be pointed out—*Ol. Carier* for *Carui*; *Infus. Cuscar.* for *Cascar.*; *Mammæ* for *Mannæ*; and *Mise* for *Misce*.

pected objections, obtained permission to attend. The reader may judge of his astonishment when, on arriving, he found that the dissection had already been completed by Mr. Wardrop!—owing, it was stated, to this gentleman not having received his message.

Under the peculiar circumstances of this case, and the importance attached to the result, it cannot fail to be matter of regret to the whole profession that the dissection was not made in the most public manner possible.

EXTRACTS FROM JOURNALS,

Foreign and Domestic.

MODE OF ARRESTING HEMORRHAGE BY TWISTING THE BLEEDING VESSEL.

M. AMUSSAT lately communicated to the Royal Academy of Medicine in Paris, an account of experiments made by him to prevent and arrest hemorrhage without the means usually employed. Observing that lacerated wounds are not accompanied by loss of blood, which may be attributed to the mode in which the arteries are torn, M. Amussat endeavoured to ascertain whether he could prevent hemorrhage by treating the arteries in a similar manner. His attempts, however, were not successful till he thought of *twisting* the bleeding vessels. The first trial having been successful, he made many others on different animals, as dogs, rabbits, horses, &c. and with the same results. His method is as follows:—An artery being cut, its extremity is seized with a pincers, the two branches of which are kept closed by means of a spring; a sufficient force is used to draw out the vessel five or six lines; it is separated from the surrounding parts; then laying hold of it with the thumb and forefinger of the left hand, the pincers is turned five or six times on its axis. The twisting ought to be continued until the portion of the vessel held in the gripe of the instrument is torn. From this torsion there results a *cul de sac*, which prevents the flow of blood. If the operation be performed without first fixing the artery with the fingers applied beyond the point of the instru-

ment, the vessel is twisted up as high as the next collateral branch.

M. Amussat has practised this method in amputation of the thigh and in extirpation of the testicle, with success. The advantages which he attributes to it are, producing more speedy union, and being able to arrest bleeding without depending upon assistants, which in the army especially would render it of great importance.

In a case of extirpation of the mamma, M. Roux, who performed the operation (August 11th), tried the plan of twisting the arteries to stop the bleeding. With two or three vessels it answered, but in as many others it failed, perhaps owing to their being deep-seated. Ligatures were then applied in the usual way.

In a case at the Hôpital Beaujou, when M. Blandin amputated the female breast for scirrhus (July 28th), after the removal of the diseased part, blood flowed very freely from an artery at the upper angle of the wound: the vessel was seized with a pincers, and twisted upon itself *four times*: the bleeding stopped, so that the wound admitted of being immediately united in the most perfect manner by adhesive straps. The artery was about the size of a crow-quill, and the pincers with which it was seized was one of those employed by watch-makers, the bits of which are square-pointed, and correspond to each other for a considerable extent by a plane surface, marked with transverse striæ, which renders them more tenacious.—*Journ. Hebdom. et Lancette Franç.*

SINGULAR CASE OF DYSPHAGIA.

A man about 60 years of age, of delicate constitution, in swallowing a large morsel of tough beef, which he but imperfectly chewed, suddenly experienced a sensation as if it had stuck at the entrance of the œsophagus. Speedily he became tormented by constant and fruitless efforts at deglutition, without being able to swallow a drop of fluid, or even his saliva. Dr. Mugna, who was called at the moment, found the patient exhausted by the constant efforts to swallow, which were repeated every instant without any effect. His anxiety was very great, and continued to increase. The breathing and speech, however, were perfectly free, nor was there any change of form or appearance to be discovered, either externally or on examining the posterior fauces. A

sound was introduced into the œsophagus: it entered with ease, and passed the point where the patient had the sense of impediment. The examination was made with the utmost care, without detecting any foreign body, and without affording any degree of relief. The situation pointed out as the seat of the foreign body was exactly the os hyoides, and Dr. Mugna suspected that the dysphagia depended upon the luxation, or rather the diastasis of the cartilaginous prolongations of the os hyoides. On this supposition he introduced the fore and middle fingers of the right hand into the back part of the throat beyond the root of the tongue, while he applied the left hand to the fore part of the neck over the os hyoides. He then moved the parts a little, as directed by authors who have mentioned this accident, on which all inconvenience eased, and the patient was able to swallow as usual.

From this time there was no return of the symptoms for two years, when on swallowing a large morsel, the same accident recurred. Dr. Mugna, guided by his former experience, adopted the same means, and with equal success.—*Annali Universali*.

RHEUMATISM TREATED BY THE APPLICATION OF ACETATE OF MORPHIA TO A BLISTERED SURFACE.

M. de St. M. of advanced age, of robust constitution, subject during twenty years to chronic rheumatism, and during the last four to an ill-defined affection of the spine, experienced occasionally severe pain in the left leg. His movements were constrained, his gait uncertain, and he sometimes fell without any apparent congestion or other symptom about the head. A variety of means were tried against this slow but progressive paralysis; among these strychnia was employed with advantage, but the patient becoming aware of its powerful nature, became alarmed, and refused to continue it. On the 2d of July he was seized with horrible pain in the left lower limb, which was convulsed. M. Blanc applied ammonia to the upper and outer part of the limb, so as to raise a blister, the size of a forty-franc piece, which was effected in ten minutes. The cuticle was removed, the surface of the skin dried by pressing it with a piece of fine muslin, and then sprinkled with half a grain of

acetate of morphia. The pains continued, and in a quarter of an hour a second blister, similarly treated, was made at the inner part of the knee. By this, a little relief was obtained, and the operation was practised yet a third time. The pain now instantly ceased, and never returned. The patient experienced some drowsiness and slight vertigo.

M. P. aged 30, of sanguine temperament, had some years ago an attack of acute rheumatism, which lasted four months, since which time he has enjoyed good health. On the 10th of July, being in the country, he was exposed to cold and wet for several hours. On returning home he experienced shiverings, headache, and severe pain in the left thigh. Next morning, as his sufferings continued to be very great, he sent for Dr. Blanc, who found him in a high fever, with his pulse at 115, great heat of skin, complete inability to move, and unsupportable pain in the affected limb. Two vesications were made on the thigh, each of which was powdered with half a grain of acetate of morphia, and some hours after the pains entirely disappeared. The disease lasted eight days more, but without suffering, and the morphia seems, therefore, to have had little effect on its duration.—*La Clinique*.

ACETATE OF MORPHIA SUCCESSFULLY APPLIED TO A BLISTERED SURFACE IN TETANUS.

A woman, 29 years of age, having general good health, received a slight wound on the brow, which she washed with cold water, and dressed with emollient poultices. Two days after incipient trismus became manifest, accompanied by contraction of the muscles of the neck and abdomen. Tetanus soon became general, and the spasms were very severe. She was then (viz. from the 22d of October to the 27th) treated five days by means of bleeding; warm baths, continued for an hour and a half, or two hours; sedative plaisters on the neck and temple; and, finally, she had a third of a grain of acetate of morphia every two hours. On the 1st of November, the disease still continuing, a quarter of a grain of the acetate of morphia was sprinkled over the skin, a blister having been previously applied, so as to produce a raw surface. The dose was repeated in a few hours. The

effect was very remarkable; in a few hours the contractions became less violent, and the trismus abated. All other treatment was now abandoned, and the third of a grain of acetate of morphia applied twice a day. The patient rapidly recovered.—*Annali Univers. di Medicina.*

EXTRACTION FROM THE BLADDER OF A
PIECE OF TWIG SEVEN INCHES LONG,
AND SURROUNDED WITH CALCULOUS
DEPOSITIONS.

M. Louis Senn, a practitioner at Geneva, has detailed the following case in the "Clinique." P. Perial, a lad aged 19, of robust constitution and small stature, was sent to him by M. Maunoir on the 6th of June. For about a year this young man (a peasant) suffered from pain in the bladder, greatly increased by passing his urine or evacuating the bowels. From time to time some small portions of calculi had been expelled with the urine; and a short time after his arrival at Geneva, M. C. Maunoir had extracted, by means of a common pincers, from the urethra, a piece of twig, from two to three inches long, which, at its posterior extremity, had an incrustation of phosphate of lime, which presented an impediment to the urine. When he was questioned as to the presence of the foreign body, he said, that not being able to make water, he had introduced the twig for the purpose of sounding himself!

M. Senn, wishing to examine the bladder with a common catheter, encountered, at the prostate portion of the urethra, a foreign body, which interrupted the passage of the instrument. When this had been passed, and the instrument got into the bladder, other foreign bodies were discovered there. The patient was free from fever; and being in a favourable state for the operation, it was performed next day. On the 8th of August a clyster was administered, which returned along with other matters; and shortly after the operation was commenced. Exploration with the catheter discovered, as before, foreign bodies in the bladder, which could not be made on striking against them to emit a clear or distinct sound. The method usual in lithotomy was adopted. The finger being introduced into the bladder, a calculus was felt, which broke beneath the forceps, and was taken out in parts. The instru-

ment was several times introduced; a large calculus laid hold of; which, however, always escaped its grasp. At length a piece of twig, from six to seven inches long, was drawn out, having three calculous depositions upon it. The part between these was occupied by fragments; and it was evident that portions had been broken off by the forceps, and now remained in the bladder. By numerous injections these were removed, and the patient did well. Being now strictly questioned, Perial acknowledged that he and his companions were in the habit of introducing foreign bodies into the urethra for the purpose of gratifying venereal feelings. He has now returned to the country to caution others, by a relation of his own danger and his sufferings.—*La Clinique.*

MODE OF APPLYING OPIUM IN STRANGULATED HERNIA.

A man, 50 years of age, had laboured for five days under the effects of a very large inguinal hernia, which was strangulated. Vain attempts had been made to reduce it, when Dr. Brulatour, of Bourdeaux, was called in. The patient was now bled, a large dose of castor oil administered, and cold applied to the tumor. These means being unavailing, a bougie was introduced into the urethra, smeared with extract of opium: two evacuations from the bowels took place, the patient fell asleep, and the hernia was easily reduced.—*Jour. de Med. de Bourdeaux.*

HOSPITAL REPORTS.

EDINBURGH ROYAL INFIRMARY.

Cases of Hernia.

CASE I.—John Johnston, æt. 45, admitted under the care of Dr. Campbell March 27th. There is an inguinal hernia of considerable size, extending downwards into the right side of the scrotum, tense, and very painful on pressure; the superimposed integuments are red and indurated, and occupied by a cicatrix which extends upwards as far as the anterior superior spinous process of the ileum. About twelve months ago the tumor appeared after violent exertion, and was easily reducible. On March 18th all attempts to reduce it were unsuccessful, and he has had no evacuation from the bowels since that period, but has laboured under constant

nausea, and occasional vomiting of bilious and stercoraceous matter. The pain in the tumor has increased, and is much aggravated by the vomiting; countenance anxious; pulse natural.

March 28th.—The operation was yesterday performed, about an hour after the admission of the patient. The upper part of the protruded intestine firmly adhered to the neck of the sac, immediately beneath the seat of the stricture; its lower portion was in a state of gangrene. The adhesions were not disturbed, and an opening having been made in the gut, a great quantity of feculent matter was ejected. A short time after the operation, slight hæmorrhage occurred from the wound, and two vessels were secured by ligature.

The fæces pass through the wound every half hour or so. A slough appears about to separate from the wound. No pain or tenderness of abdomen; no vomiting since the operation; pulse 90.

30th.—Flatus is occasionally evacuated per rectum.

31st.—Fæces pass through the wound in less quantity, and at longer intervals. Had some feculent evacuations per rectum last night and this morning.

Natural stools are procured by the frequent exhibition of enemata of tepid water, and occasional doses of castor oil.

April 4th.—The slough has in part separated. He has had a copious natural evacuation, and very little fæces have passed by the wound. A probe passes freely upwards and downwards from the aperture in the gut.

10th.—Complains of severe cough; no pain of chest; pulse 100, and weak. A compress was applied to the wound, producing no inconvenience. On its removal, a considerable quantity of feculent matter was discharged through the aperture. Ordered more nourishing food.

14th.—No feculent evacuation through fistula.

Attempts were made to close the wound by adhesive plaister and compress, but were not persevered in, in consequence of the irritation produced.

May 21st.—All the fæces pass per anum; a little frothy matter escapes through the fistula, and a light truss is occasionally used.

June 2d.—The truss is discontinued, it having produced no apparent benefit.

15th.—There is still slight discharge from the fistula. The bowels are regularly opened by injections.

July 29th.—A red-hot wire has been repeatedly applied to the edges of the aperture, which is contracting slowly. Health good.

CASE II.—Isabel Johnson, æt. 60, admitted under the care of Mr. Lizars, July 14. There is a femoral hernia of considerable size, and the patient labours under the usual symp-

toms of strangulation of the gut. She has been subject to hernia for five or six years; the tumor became irreducible four days previous to admission.

The operation was immediately performed. On opening the sac, purulent matter, mixed with flakes of lymph, escaped. The intestine was firm in texture, of a dark colour, and slightly coated by lymph. The stricture was divided, and the gut was returned. The integuments were brought together by sutures, and a compress and bandage applied. Castor oil and emollient injections were administered; and, as she complained of considerable pain in the abdomen, fomentations and leeches were applied.

July 17th.—Bowels freely opened by castor oil; no pain of abdomen.

18th.—Last night the pain of abdomen returned, and gradually increased. A draught of laudanum was given, and fomentations applied to the belly.

At eight A.M. her pulse was very feeble, and she complained less of pain. At eleven she expired.

On opening the abdomen, the portion of ileum which had been protruded was seen of a dark colour; and in one point its coats had given way, and about $\frac{3}{4}$ of the contents of the bowel were effused into the peritoneal cavity; through five minute apertures, which were surrounded by coagulable lymph. The neighbouring convolutions of the small intestines were of a faint red colour, and in some places slightly adhered to each other.

CASE III.—On the 25th of July a stout and muscular man, æt. 55, was admitted under the care of Mr. Liston, at seven P.M. There was a large tense scrotal hernia on right side, and he laboured under violent symptoms of strangulation of the gut. The abdomen was swollen, remarkably tense, and painful on pressure. For the previous three years he had been subject to hernia, and on one occasion the gut had been returned with great difficulty.

On this occasion, notwithstanding copious bleeding and the use of the warm bath, all attempts to reduce the bowel proved ineffectual; and from the urgency of the symptoms, the operation was performed without further delay. On the external ring being exposed, it was freely divided by a bistoury, and an attempt was made for a short time to reduce the contents of the sac. The sac was then exposed and laid open: it contained the cæcum, and beneath it two folds of the ileum much distended; the cæcum appeared twisted, as the ileum entered it in a direction from right to left. The small intestine was of a dark red colour, and in some points slightly ecchymosed. The cæcum was of its natural colour. The inguinal canal was freely exposed by the bistoury, and the small intestines, after repeated attempts, were

with difficulty reduced. The bistoury was again used, and Mr. Liston attempted to untwist the cæcum; but this, and all efforts to reduce it, having proved ineffectual, even after a large quantity of tepid water had been injected per anum, and it being impossible to cover the bowel by the hernial sac, the integuments were brought together by sutures.

Immediately after the operation, as much gruel (containing castor oil) as the gut could contain, was injected per rectum; but was almost immediately evacuated.

The symptoms having progressively increased in severity, at six A.M. the cæcum was freely opened, on which a quantity of air escaped. A tube was introduced through the ileo-cæcal valve, with a view of injecting fluid into the small intestines, but this proved impracticable, from the resistance opposed to the passage of the fluid; a small quantity passed, by similar means, into the colon. He lingered on till mid-day, when he expired.

The body was opened two hours afterwards. The cæcum was of a dark livid colour; the commencement of the right colon was twisted—its termination was much contracted, and impacted by hardened fæces. About six feet of the small intestines passed beneath the cæcum, and were of a dark livid colour, and contained a mucopurulent fluid, tinged with blood.

Mr. Liston stated that it appeared probable that, in consequence of the cæcum having been frequently protruded, its peritoneal attachments had become elongated, so as to permit it to pass over the mesentery of part of the small intestines, as it descended into the hernial sac.

ROYAL WESTMINSTER OPHTHALMIC HOSPITAL.

Oil of Turpentine in Inflammation of the Eye.

MR. GUTHRIE has been lately giving a trial to the oleum terebinthinæ in cases of inflammation of the iris and choroid coat, on the plan recommended by Mr. Hugh Carmichael, of Dublin, and with a nearly analogous result. In some cases it has succeeded admirably; in others it has been of little service; and in some, unequal to the cure of the complaint. The irritation produced on the bladder and kidneys is occasionally severe, after the exhibition of a very small quantity, whilst much larger doses are borne by others with a perfect immunity from it. We have selected some cases illustrative of these points, and only premise that the turpentine has always been given in a solution of gum Arabic and nitre, and the trial has been made in common, rheumatic, or arthritic, and syphilitic inflammations. Mr. Guthrie thinks the remedy most valuable

in the arthritic inflammations, which do not yield to mercury alone, but seem to be amenable to the conjoined effects of it and the turpentine, or to the latter alone.

CASE I.—Mary Tyler, æt. 16, admitted July 3, 1829, having iritis of the right eye, which has been inflamed for the last week. Says that she has not long recovered from an attack of inflammation of the same kind in the left, for which she took mercury. The pupil is irregular, and the colour of the iris changed; the conjunctiva and sclerotica are not much affected; the vessels of the latter form a zone of a pink colour round the cornea; the discharge of tears and intolerance of light are very trifling, and the cornea is quite transparent; her sight is, however, very much impaired. She complains principally of the pain over her brow, which becomes very severe when she is in bed, so much so, that she has had very little rest since the commencement of the inflammation. There is a lichenous eruption on her body, looking very much like the syphilitic, but she denies ever having had that disease, and says, that the eruption appeared about four months back, immediately after her recovery from the small pox.

Capiat Ol. Terebinth. ʒj. ter die.

4th.—The medicine has produced a very decided and beneficial effect; the pupil is a little more dilated, and quite circular, and she suffered much less pain than usual last night; the inflammation of the conjunctiva and sclerotica remain just the same. 8 P.M. The pupil is considerably dilated, and she says that she can see much better; the sclerotic inflammation is also somewhat diminished.

Rep. Ol. Terebinth.

5th.—Slept quite free from pain last night, but early this morning she was sick, and complained of pain in her forehead: these unpleasant symptoms went off after taking some warm tea. The inflammation of the sclerotica is a little increased, but the iris remains the same. Her bowels rather confined.

Pulv. Jalap. Comp. ʒj. statim. Rep. Ol. Terebinth.

7th.—All traces of the inflammation are gone, except a very slight tinge on the sclerotica, and she has perfectly recovered her sight; it was, however, thought advisable to continue the medicine for a day longer. The eruption remains exactly the same as when she was admitted.

In this case the oil of turpentine did not cause the least pain or difficulty in making water.—Case by Mr. Taylor.

CASE II.—Sophia Prout, æt. 27, admitted July 13th, 1829. Has had a speck on the cornea for 20 years, in consequence of inflammation. There is slight inflammation

fast; is quite free from pain; pupil still continues irregular; her mouth rather sore.

Rep. Pil.—Empl. Belladonnæ fronti.

23d.—Eye considerably better; mouth very sore.

Omitte Pil.—Extr. Coloc. C. gr. v. h. s. s.
Mag. Sulph. ʒss.

23d.—The belladonna plaister was repeated last night, and the eye is less inflamed.

Rep. Pil. et Magn. Sulph.

24th.—The inflammation is now very trifling, but the pupil continues irregular.

Gutt. Belladonnæ om. man.

Her mouth is still very sore.

Gargarisma aluminis, sæpe utend.

August 13th.—Discharged cured, the eye having resumed its natural appearance.—
Case by Mr. C. H. James.

The turpentine failed in this case, and mercury was had recourse to with success*.

ST. GEORGE'S HOSPITAL.

Lithotomy—Extraction of a Mulberry Calculus.

ROBERT HUGHES, æt. 24, admitted July 15, under the care of Mr. Hawkins. Has had pain after making water, and in the glans penis, as long as he can recollect; but more severe during the last month, during which time it has been accompanied with difficulty in passing it. For the last three weeks the urine has constantly dribbled from him, and has frequently been followed by blood.

The urine is acid, and occasionally contains some mucus; the bowels are out of order; the complexion pale; the health pretty good. On passing a sound, a stone, apparently of considerable size, and rough, is distinctly felt and heard on the right side and lower part of the bladder. There is some obstruction to the passage of the sound experienced just on its entrance into the bladder, the parietes of which appear from the rectum, as well as at the apex, to be thickened and rough.

Hyd. Sub. gr. iij. h. ss. H. Sennæ cras mane.

18th.—Sod. Carb. gr. xv. Magnes. Carb. gr. v. M. ter die.

No stone perceived to-day on introducing the sound.

21st.—Bal. Coxar. o. n. Pil. Sap. c. Op. gr. v. o. n. s.

28th.—Still much pain on passing his motions or water, which is attended with

scalding; urine throws down much mucopurulent sediment, and occasionally "white matter" follows its discharge; occasional pain in the loins, and numbness in the penis after micturition; pain on pressure from the rectum on the prostate gland, which feels larger than natural. On passing a sound, some obstruction is met with at the cervix vesicæ. On one occasion, whilst the water came away by the *side* of the catheter, bloody pus issued *through* it, whilst no stone could be detected; on withdrawing the instrument and passing it on without turning, it readily entered the bladder and touched the stone. The inference drawn from these circumstances by Mr. Hawkins was, "that a cavity secreting matter existed by the side of, and close to, the neck of the bladder, probably excited in the prostate gland by the irritation of the stone." His health was now rather deteriorated than improved, and he suffered from occasional rigors.

Rx Dec. Cinch. ʒiss. Sod. Carb. gr. xv.
Magnes. Sulph. 3ss. M. ter die s.
Om. Pil. et Pulv.

On the 11th, the tongue being constantly foul, with habitual costiveness, he was ordered five grains of the compound aloetic pill every night; and on the 15th he is reported as much better. There was less mucus, and no pus in the urine, which was also longer retained. The catheter passed with more ease, but still not without some obstruction; and the prostate, when felt by the rectum, appeared to be lessened in size. On the 22d there was little pain after making water, and scarcely any sediment; and he could retain his water for several hours. His health was now so much improved that on the 27th the lateral operation was performed by Mr. Hawkins; and a stone, of the mulberry species, extremely rough and irregular, was extracted. The stone was nearly circular, about the size of a walnut, and weighed eleven scruples. The instruments employed were a long-beaked knife and blunt gorget, on which the forceps were introduced. The bladder contained a large quantity of urine; and hence, on its collapse, lay in folds over the stone; which circumstance, with the acicular roughness of the latter, induced Mr. H. to use much caution in effecting the extraction. A little arterial bleeding subsequently took place, but it soon ceased, and the pain likewise subsided.

He went on well till the night of the 29th, when he felt a slight sense of shivering, which was not succeeded by heat, which Mr. H. thought might be owing to some blood in the wound; the lips of which were slightly separated by the fingers; the urine having, however, passed freely, both by it and by the urethra. In the morning, the tongue being rather foul, and the bowels not fully opened by a dose of castor oil, he was

* Med.-Chir. Rev. No. 22.

ordered some house-physic, which operated several times. In the evening a small coagulum of blood came away by the urethra; and the urine was also tinged with blood. Next day he was allowed some fish; and on the 31st the wound was found to be suppurating freely. The urine was quite clear, and the pulse no quicker than before the operation.

On the 1st of Sept. he was ordered a dose of calomel and colocynth; and in the night he had a second slight rigor, followed next morning by sickness and quick pulse. The bowels had not been opened, and house-physic was prescribed. On the 3d he was better, but the wound was slightly incrustated with sabulous matter; it was touched, to render it cleaner, with the tincture of myrrh. On the 4th, five grains of the pil. aloes comp. were ordered to be taken every night; and on the 5th it is reported that much thick brown mucus passed by the wound, through which the water is again exclusively discharged. The bowels were not open.

Haustus Sennæ.

On the 6th, a little urine, preceded by mucus, issued per urethram, and on the 7th he complained of pain in the penis, especially on making water. The discharge continued, and the mucus appeared to be tinged with blood. Wound injected with water.

8th.—Less discharge of mucus, and that lighter. Water again passed by the urethra.

R Dec. Cinch. \mathfrak{z} iss. Magnes. Sulph. \mathfrak{z} iss. Tr. Cinch. 3j. M. bis die.

On the 10th, the quantity of the magnesiae sulph. was increased to \mathfrak{z} ij. in each dose. The urine is principally voided by the wound, and accompanied with much tenacious mucus; it is passed rather oftener than it should be, and is accompanied with pain in the line of the urethra, at least of that portion which has been divided. No pain in the loins, but a little in the right iliac region. Appetite and strength improved. Tongue still rather foul. Pulse quicker and sharper than natural.

13th.—R Mist. Camph. 3x. Magn. Carb. gr. xv. Sodæ Carb. gr. xv. M. ft. haust. ter die sumend.

14th.—The quantity of mucus secreted continues to be very great, it is very thick and ropy, and gives a good deal of pain in passing, but not at other times. He complains of pain in the lower part of the abdomen, on the right side, and has some tenderness and swelling of the right testicle. On examination, Mr Hawkins ascertained that the tenderness of the abdomen was confined to the course of the spermatic cord, and believed it to arise from irritation propagated along the vas deferens to the testicle, but did

not think it necessary to do more than apply cold lotion in the direction of the pain. A silver catheter was passed into the bladder, and some warm water injected, and a purgative administered.

16th.—The injection has been repeated each day, and apparently with advantage to the feelings of the patient, though he still has pain in passing the water. The quantity of mucus is a little diminished, and the urine rather less high coloured. The swelling of the testicle has entirely subsided, and the pain in the iliac region is less; but the vas deferens is felt hard and enlarged through the abdominal muscles. The wound is nearly closed, so that only a little water passes through it when he is standing. His tongue is cleaner, and his health seems scarcely at all disturbed by the irritable state of the bladder.

The unusual circumstances attending this patient's case possess considerable interest; the state of the urinary organs, and the gradual recovery of health before the operation; the very copious secretions from the bladder, and the irritation of the testicle and its duct; the latter symptoms not returning till the effects of the operation might be expected to have subsided, constitute a train of symptoms, which to those who watched the case afforded several instructive observations.

The case appears now to be in a fair way to perfect recovery. Should any new symptoms, however, arise, our readers shall be put in possession of them.

LITERARY ANNOUNCEMENTS.

In the press, *An Exposition of the System of the Nerves.* By Charles Bell, Esq. Second Edition, with an Appendix of Cases. 1 vol. 4to. with Engravings.

Dr. Duckle has in a state of readiness for the press, in 1 vol. 8vo. *A Treatise on the Mucous and Serous Membranes; which will comprehend their Anatomical Description and Physiological Structure—their Diseases and Pathological Anatomy.*

NOTICE.

We think the work alluded to would probably answer well. The table we should like to see complete before we promise. Our opinion is favourable.

ERRATA.

In the last number, page 479, for "14th ult." read "14th of May."

Page 480, for "accidente," read "accidente;" and for "pro re," read "pro re nata."

THE LONDON MEDICAL GAZETTE,

BEING A
WEEKLY JOURNAL

OF
Medicine and the Collateral Sciences.

SATURDAY, SEPTEMBER 26, 1829.

CLINICAL
LECTURES ON ELEPHANTIASIS.

BY M. BIETT.

(Taken for the MEDICAL GAZETTE, by a
Correspondent in Paris.)

[Concluded from page 485.]

LECTURE II.

THE *Diagnosis* of this disease is of great importance. The name of lepra among the ancients has contributed to throw more than common obscurity over this part of the subject. The lepra of the moderns is a perfectly different complaint. One of its varieties, however, the lepra tuberculata of some writers, has been confounded with it. Lepra may be distinguished from elephantiasis by the whiteness of its scales, the elevated border of its patches, and by its more or less circular form: whereas the elephantiasis *anaistotos* (the form which has been confounded with lepra) may be recognized by the largeness and irregularity of its patches, the affection of the joints, and the ulcerations. It may also be distinguished from the elephantiasis tuberculata, in its early stage, by the loss of sensibility in the affected parts; and by the absence of the white scales, one of the distinguishing features of lepra. It has been frequently confounded, and that too by eminent men, with syphiloid eruptions; and some have gone so far as to say that elephantiasis is the consequence of syphilis; and, in short, that elephantiasis is neither more nor less than syphilis modified by climate. This bears, however, the stamp of absurdity. Children are the subjects of this disease

at an early age; and children whose parents have neither been affected with primary nor secondary symptoms of syphilis. The importance of making this diagnosis may be exemplified by the following case:—

A young man, from Martinique, without any of the constitutional precursors of elephantiasis, became affected with this disease, and was early placed under M. Biett's care, who administered arsenic with marked advantage; but as his recovery was slow, and the young man was rich, another practitioner was consulted, who pronounced the disease to be an eruption of a syphilitic nature. The patient denied his ever having had any primary symptoms; another surgeon, celebrated for his knowledge of syphilis, was consulted; and though M. Biett pointed out the insensibility of the skin, and the red tinge of the spots, yet this practitioner also decided against him. M. Biett was not to be daunted; he requested that the opinion of a gentleman at the head of a venereal hospital might be obtained; and, after some time spent in argument, this gentleman was brought to coincide with M. Biett. It was now too late: the arsenic had been omitted some weeks; tubercles began to appear; and the patient never recovered from his disease. M. Biett would always distinguish the disease from syphiloid eruptions by the reddish (*fauve*) colour of the spots, opposed as it is to the copper-coloured eruptions of syphilis, and by the insensibility of the skin.

It is sometimes confounded with lupus. [M. Biett here showed us a case of tuberculated lupus, which he said was the most difficult to distinguish.

2 L

from elephantiasis; and putting the two patients by the side of each other, bade us never mistake it. Placed as they were, to mistake them appeared impossible. The case of lupus had a deep crimson tinge over the parts in the neighbourhood of the eruption; the tubercles had not the glassy appearance which were distinguishable in the case of elephantiasis; and though the face was swelled in both instances, in lupus it had an appearance of tension, whereas in elephantiasis the skin had yielded. There is also a circular appearance in the former; whereas the latter is a more general affection, and has no circumscribed form. These appear to me to be the distinctive marks; but a single view, such as this, would show in an instant that the diseases are exceedingly different.

The *Prognosis* is always unfavourable; but it will vary with the earliness or lateness of the disease, as it is presented to our notice; with the severity of the attack; with the state of the patient's general health; with the climate in which he is resident; and whether the mouth, larynx, and pharynx, are affected. In the latter case the patient cannot live long.

This disease does not offer a favourable example of the power of medicine, but M. Biett is no advocate for the abandonment of patients, as is too often done in this disease, particularly in its early stages.

LECTURE III.

M. Biett commenced his lecture to-day by again pointing out that elephantiasis had been declared to be hereditary as well as contagious; both which opinions are equally groundless. Its obstinacy was known to the ancients, who all speak of the ill success of their medicines. The moderns must in a great measure concur in the confession. The treatment did not consist in the exhibition of medicines only, but in management. According to the present state of our knowledge, the treatment consists rather in avoiding every thing that is hurtful than in endeavouring, by powerful remedies, to subdue the disease. Yet there are some which should not be entirely disparaged; change of climate is absolutely necessary; for if the patient remain in the country in which the first seeds of the disease are sown, the exciting cause continues to operate, and we must expect

that the progress of the malady will be more rapid than it would be otherwise. It has been found that a cold climate has some power in arresting the disease. One of the cases before us will show that this is not always sufficient to prevent its appearance, or to stop it, as the boy was attacked two months after he had been in this country. There is a small island off the coast of South America, (the reporter could not catch the name), the air of which is remarkably salubrious. The natives of America are aware of this: they resort to it; and have found that here its progress has been arrested, and even a cure has been obtained.

Secondly, attention to the cleanliness and comfort of the patient. This is of the utmost importance, for if he be rendered irritable, the disease always runs through its course more rapidly. Thirdly, abstinence from all stimulants. Slightly bitter ptisans are the best drinks. A little light wine, however, may sometimes be found useful. Fourthly, daily exercise, in order to increase the tone of the muscles, but not to such a degree as to fatigue. Fifthly, attention must be paid to the secretion of urine, as there is little perspiration. His body also should be frequently washed, not only for cleanliness sake, but to give every encouragement to the restoration of perspiration. Sixthly, the bowels should be kept open by the use of clysters. Seventhly, but above all things, it is necessary to keep up the patient's spirits, for by constantly beholding the ravages which the disease makes, they become depressed, and sink more rapidly. A lady came under the care of M. Biett, who had contracted the complaint at Martinico, and was ultimately cured. He attributes his success in this case much more to the unremitting care of her husband and children than to the remedies he exhibited. So much for the regimen and moral management, upon which the greatest reliance is to be placed. Yet there are other means to which we must resort.

Blisters may be applied in succession to the horny patches, with the happiest effect. M. B. cured a case in a young man of fortune, from the West Indies, only last year, by the repeated application of blisters. Mr. Robinson, of India, mentions their good effects in elephantiasis anaistotos.

The utmost attention must be paid to the digestive organs; not merely for the sake of preserving the general health, but because, when the stomach is disordered, the tubercles appear more rapidly in the alimentary canal, and these hasten the dissolution of the patient.

Sudorifics have been much recommended; as sarsaparilla, guaiacum, sassafras. M. B. however, doubts their usefulness: the cases reported to have been cured by these remedies have most of them been syphiloid tubercles.

A plant known to the Hindoos, and much esteemed by them, *Asclepias gigantea*, has been extolled as a remedy in this disease. Mr. Playfair, who described it, and gave it the name of the vegetable mercury, has evidently exaggerated its virtues. Robinson and Ainslie have found it occasionally useful, as in elephantiasis anaistotos; but they say it often fails, and is never useful in the tubercular form. Dr. T. Heberden mentions a case cured by peruvian bark. Many other plants have acquired some fame. But it is not the vegetable world alone which has been ransacked for remedies; the mineral kingdom also furnishes some which enjoy a considerable reputation.

First, mercury. Some authors extol it highly, others deny its power entirely, and a third party pronounce it highly injurious. M. Biett is of opinion that the first and last of these opinions are right, as he has seen two or three cases like the following. A lady in Italy suffered from elephantiasis tuberculata. Professor Sordani prescribed mercury for her. She then came to Paris, and fell under M. Biett's care: as she was getting better he saw no reason for altering the treatment. She went on well for some time, and appeared to be recovering, when she was suddenly attacked with fever. The tubercles inflamed rapidly; suppuration followed universally; and the patient died in a few days. M. Biett thinks that her death would not have taken place so suddenly had not mercury been exhibited. The preparation which is usually employed is the oxy-muriate.

Secondly, arsenic. Both the oxyde and its salts have been tried very largely in the West Indies. They commonly use it in the proportion of gr. j. of the arseniate of potass, to gr. vj. of black pepper, in the form of pill. It is

sometimes given to the extent of gr. v. in the course of the day. M. Biett has seen patients treated in this way who improved for some time, but they finally died *of the remedy*. He still thinks that arsenic may be employed with advantage if given in moderate doses.

Thirdly, iodine. M. B. believes he is the only person who has tried it in this country, (France): he has employed it both externally and internally. A young man, who had been eighteen months in the island of Bourbon, was affected with the disease, and was completely cured by this remedy. The account of the case is published in the *Journal Hebdomadaire*, by M. Cazenore. He tried it in another case with apparent benefit; when the patient was attacked with inflammation of the pleura, and died. As upon examination after death no marks of tubercles in the larynx or lungs were discovered, M. Biett concludes that this was accidental. M. B. employs the hydriodate of potass, and the iodide of mercury, externally, with advantage, but does not find the remedy by any means uniformly successful, particularly if the disease be far advanced.

The animal kingdom affords a few remedies of some name, though M. Biett thinks them not of the slightest service. First, tincture of cantharides. The patients have always become worse under its use: it seems to forward the inflammation of the tubercles. Secondly, vipers have a great reputation: various ancient writers, and among others Celsus and Galen, speak loudly in their praise. The poet Tibullus, however, gives us the rationale of their fame. Vipers lose their skins at certain periods, and seem to acquire new vigour. If, says he, lepers could but eat these vipers, they also might cast their skins, and obtain the same benefit. This reasoning does very well for poetry, but is not quite conclusive enough to satisfy a physician.

LECTURE IV.

The subjects of this day's *clinique* were two men; the one above 65, and the other about 30. The former has been affected with elephantiasis arabica during rather more than forty years. He has lately been admitted into La Pitié. The surgeon, however, forwarded the case to the Saint Louis, to give the pupils the benefit of M. Biett's

observations on it. The left leg is swollen to nearly twice its natural size; the swelling commences at the calf, and extends to the toes. Hard pressure gives intense pain. The skin is covered with a horny coat, of a yellow colour, about a quarter of an inch thick, and intersected with deep rugæ in every direction. His general health is affected; his constitution appears to be broken up, although he seems to be free from any acute disorder. The disease began in the West Indies, at the time mentioned, by a series of superficial erysipelatous inflammations, which have gradually left this hardness in the deeper textures. No treatment has been yet employed. The other patient is an Englishman, who likewise contracted this disease in the West Indies; but after having been in the Saint Louis six months he is nearly cured. The leg is now something enlarged, and rather hard. Elephantiasis arabica, or the Barbadoes leg, as it is called in England, was familiar to the ancients; and has received its name from its having been well described by the Arabian writers, particularly Rhazes. It is well known in many tropical climates, both in the east and west; it is best known in Egypt, and on the banks of the Ganges; but it is also found in the West Indian islands. The English pathologists, Willan and Bateman, have confounded it with *elephantiasis des Grecs*, but this must have been from their not having had personal opportunities of making observations upon it*. It has, however, been well described by Dr. Hendy, of Barbadoes. Dr. Alar, a French physician, has likewise written on it. He has seen it not only affect the legs, but the whole lymphatic system. It is no uncommon thing in the Antilles to see it affect the arms, and in India its most common seat is the scrotum. It commences with slight superficial inflammation, accompanied by vesicles, great constitutional disturbance, and much fever. This fever has been mistaken for the cause of the disease; it is the effect of it—it is sympathetic fever. These inflammations ap-

pear at first in small patches in different parts of the leg; they gradually approach each other, and finally coalesce. The leg then becomes indurated, and a yellowish lymph exudes from it: this goes on to a great extent, till the leg becomes as hard as a stone. It is worthy of mark that the dorsal part of the foot is generally more swelled in proportion than any other part of the body; but the sole never becomes in the slightest degree affected. The toes retain the power of feeble motion; occasionally, a few tubercles make their appearance, but they do not form an essential part of the disease. Eczyma occasionally puts on an appearance somewhat resembling elephantiasis arabica: there is a case now in the hospital, admitted three weeks ago. The woman is a worker in copper; the particles of the metallic oxyde have caused the appearance of this eruption on the hands; the inflammation has run high; large vesicles have formed, have burst, and concreted into something like the horny substance covering the leg; but this disease may be distinguished from elephantiasis by the rapidity of the formation of the crusts, and by their falling off in a few days. The crust, in elephantiasis arabica, requires many years for its completion. The cause of the disease is entirely unknown. The diagnosis does not require to be further dwelt upon, as it is almost impossible to confound it with any other. The prognosis should be always serious, as it requires much time to cure the disease, and the patients' constitutions are generally broken up. The treatment consists, if the patient be strong and full-blooded, in general and local bleeding, occasional purging, local and general warm bathing; and after the inflammation has subsided, slightly stimulating alkaline and sulphureous douche-baths; but perhaps constant and regular compression is more useful than all these. In old patients the same treatment must be employed, excepting that general bleeding will not be found necessary, and local bleeding, even, will be too much for the patient. M. Biett intends applying bandages in the first case as tightly as the patient can bear them; which, with baths, will constitute the whole of the treatment. Though the case be severe, M. B. looks forward to its favourable termination.

* This must be a mistake of M. Biett's. "By the surgeons of the present day the appellation of elephantiasis is appropriated to a disease altogether different from the malady so called by the Greeks, &c. It is called by Dr. Hendy the glandular disease of Barbadoes, in which island it is endemical." "In England it is often called the Barbadoes leg," &c. Bateman's Synopsis, 2d edit. page 304.

ON BLOOD-LETTING

IN THE COLD STAGE OF THE PAROXYSM OF

INTERMITTENT FEVER.

BY

THOMAS RIDGWAY, M. D.

Licentiate of the Royal College of Physicians of
London, &c.

THE mode of treating intermittent fever by the free and fearless abstraction of blood in the cold stage of the paroxysm, proposed by Dr. M'Intosh, of Edinburgh, which he first essayed in his own person, and has since extensively and advantageously practised, militates so strongly against received opinions and existing prejudices, and seems so calculated to excite alarm and apprehension, that notwithstanding the full evidence he has adduced, and is still continually bringing forward, in proof both of its utility and perfect safety, not a single practitioner, as it would appear, has yet dared to deviate from the beaten track, and to employ it in this country.

It was in anticipation of such a consequence that I thought proper to insert a paper in the *Medical and Physical Journal* of July, 1827, with the hope that, by contributing the result, though small, of my experience on this interesting subject, I might assist in assuring many, who, if not deterred by their fears, might be disposed to adopt a remedy which promised such important advantages.

In that paper I advocated the principles of Dr. M'Intosh, asserted the dangers of visceral congestion, inculcated the necessity of venous depletion, and, fortified by my own experience, spoke strongly to its efficacy, as well as perfect freedom from danger, although employed in the first stage of the paroxysm, and in a state of the system which appears to indicate the extremity of depression.

With the same intentions I now present the following instance of the employment of this method of treatment, which, as it has occurred in London, may bring the matter into more immediate view, perhaps tend more effectually to deprive it of its imaginary terrors, and possibly induce a greater degree of attention to a point of medical practice that teems with important consequences.

A young peasant girl, sixteen years

of age, had passed all this first portion of her life in her father's house, in one of those unhealthy villages in the lower part of Kent where intermittent fever ever flourishes; and, of all the family, she alone had as yet escaped its influence.

It was about six months before the time of which we are to speak that this young person was sent up to London, to the care of an elder married sister, who placed her in service not far from herself, in the neighbourhood of Fitzroy-Square. Here, as it is to be feared is much too often the unfeeling practice, she was put to sleep, with damp bedding, in a cold wet kitchen, or rather cellar. The girl immediately fell sick, and came under the care of a medical practitioner in an adjoining street, who having ascertained that the disease with which she had become affected was intermittent fever, essayed every means in his power, for some time, to arrest the paroxysms. Failing in this, he advised her, as her last and only resource, to leave London, and go again into the country to her family, which, it may be presumed, he was not aware, dwelt in the village in the aguish district of Kent, already mentioned.

In compliance with this advice the poor girl left her place, and went down to her home, where, after a time, by the assistance of her mother and the village practitioner, and the help of many remedies, the paroxysms were abated, and ceased. No sooner did she feel perfectly freed from them, than she returned to London; and, as it happened, in very unfavourable weather. Her sister once more placed her near herself, but in another situation, in which she had hardly entered on her duties, when she was unfortunately again seized with the paroxysms, which returned with as much violence as ever, but recurred at a quotidian, instead of a tertian period. Her mistress, a kindly disposed and amiable person, was loth to part with her under these circumstances, and appealed to my opinion on the probability of her immediate recovery. Being desirous of assisting the kind intentions of the lady, I undertook to arrest the disease, by the means which of all others seemed to me most certainly capable of effecting this purpose—the abstraction of blood, which, in consonance with the opinions I have before

expressed, I preferred to employ previous to the formation of, rather than in the cold stage of, the paroxysm; although, from the probably long existing, predisposition to the disease, and its endurance and obstinate resistance of every other remedy, the immediate and decided success of this means was made but too doubtful.

The paroxysms were understood to come on about ten o'clock in the morning, but by a mistake of the messenger I was not conducted to the house until it was near that hour; and I also found that, instead of recurring at a regular period, the paroxysm of to-day had anticipated that of yesterday by the space of about an hour, so that when I arrived I found the cold stage had already existed for nearly that period, and was now passing away, and resolving itself into the hot stage. The skin was acquiring gradually an ardent heat, the pulse was exceedingly small and frequent, the respiration anxious, and the rigors were mitigated to shuddering; but she still sat leaning forward, vainly seeking relief from the heat of a large fire.

Believing the paroxysm too far advanced to be influenced even by the means with which it was threatened, I yet hesitated not to proceed; the conviction that it could have no injurious effect being strengthened by the hope that it might be promptly beneficial, and by the assurance that the trial would at least serve to determine whatever effect might follow the remedy employed at this particular point of the paroxysm. The girl was of a full and leucophlegmatic appearance; the skin and cellular texture were thick, and the veins small and reticulated; so that the blood flowed slowly from the arm, to the extent of ten or twelve ounces. She felt faint and sick, and rejected from her stomach all the fluid she had drank, with other matters. The shudderings afterwards immediately subsided, and she described her feelings as perfectly comfortable. Two hours after, she was found quite tranquil; the heat of the surface was not, nor had been, greater than natural; the pulse was eighty-five, and quiet; and thus finished the paroxysm. The blood shewed a strong coat of lymph. So favourable an inclination of this paroxysm led me to indulge the hope that the next would be averted. It did come on, however, but not until an hour after

the period of its expected accession. The rigors were most vehement, the distress exceedingly great, and I resolved to repeat the attempt of the preceding day, by taking away more blood; which, at this earlier period of the paroxysm, and if practised with greater decision, might be productive of a more determinate result. But the blood flowed still more slowly than on the former occasion, and the state of distress forming an obstacle to the protraction of the operation, a greater quantity was not obtained. No inconvenience whatever resulted from this measure; some relief of the rigors and distress followed, and the succeeding stages of the paroxysm glided easily away. The next day, and to my surprise an hour earlier, another paroxysm arose, equalling the former in violence, but having this remarkable difference, that the sweating stage, which had hitherto been hardly expressed, was in it fully developed.

The occurrence of this last paroxysm appeared to put an end to the hope that the blood-letting which had been practised would be effectual in arresting the disease. I thought to pause, therefore, and await further indications; but examining the state of the abdomen, and finding it tumid, I imagined some benefit might accrue from evacuating freely its accumulated contents. Twelve grains of extr. coloeynth. comp. with three of calomel, two of antimonial powder, and a drop of oil of mint, were formed into four pills, and given before the paroxysm had ceased: they were slow in acting, but, before the next morning, had produced a full effect. The following day, we were pleased to find, brought no paroxysm: the girl recovered her health and spirits, but in a fortnight after, having incautiously exposed herself to the weather, a paroxysm shewed itself; the same medicine was administered, and no other paroxysm has since followed. Her complexion is becoming more florid, her constitution evidently improving, and she goes through her work with vivacity and cheerfulness. It is now more than a fortnight that she has continued entirely free from disease, without the assistance of any other remedy.

I have entered fully into these details in the belief that they may both serve usefully, in some points, to illus-

trate the history of this remarkable disease, as in others to assist in determining the comparative influence of blood-letting in certain periods of the stages of its paroxysms. The lengthened state of predisposition called into activity by change of place and circumstance; the cessation of the disease under remedies in the very focus of miasmatic exhalation; the resumption of the paroxysms, under another form, on the return to the same situation; the insufficiency of blood-letting at the period of passing of the cold into the hot stage, and in the midst of the cold stage to prevent the recurrence of the paroxysms, and their easy and immediate cessation after the effect of a simple evacuant, all form matter for curious and interesting reflection, wherefrom the elucidation of a singular phenomenon of this disease may, perhaps, be elicited, and its treatment determined.

It is obvious that blood-letting was, in this instance, perfectly safe, and, I think it will be admitted, was also useful in mitigating the disease, and, if not in terminating, at least in rendering it amenable to the influence of other remedies, which might have been in vain employed without it. From all that has yet appeared, I feel disposed to infer that the opinion I formerly hazarded is not very distant from the truth: that blood-letting is, in intermittent, a remedy of the highest value; but that, to be effectual in promptly interrupting its paroxysms, it must be practised either before the accession of the paroxysm or at least as soon as possible after it has entered on its formation.

London, May 20, 1829.

CASE OF MRS. DENMARK.

MUCH as we have the misfortune to differ with Mr. Wardrop in the inferences he has drawn from the cases in which he has tied the artery on the distal side of aneurism, and greatly as we believe he deceives himself with regard to the reception which his proposed revival of Brasdor's operation has met with from other surgeons, we think it right to lay before our readers his own account of one of the cases which has excited most discussion. The circumstance which appears to us most remarkable is, that Mr. Wardrop is to deposit the preparation in the museum of the *College of Surgeons*!

ANEURISM OF THE INNOMINATA,

Treated by tying the Subclavian Artery.

By JAMES WARDROP,

Surgeon to the King.

Having fully explained in my work on aneurism, and, previous to that publication, in the pages of the *Lancet*, the pathological principles which led me to operate in aneurism, by placing the ligature on the *distal* side of the tumor; and the soundness of these principles having not only been recognised, in a manner highly gratifying to me, by the distinguished surgeons of this country, but by those of the Continent also, and the new operation having been successfully practised by others, I am eager to embrace every opportunity of submitting to the profession any circumstance which may serve still further to elucidate this important subject.

And although the principle, that it is not necessary for the cure of an aneurism that the circulation of the blood in the tumor be completely stopped, has been established, and the fact, that aneurism may be cured by tying the vessel on the *distal*, as well as on the *cardiac* side, has been proved, yet, at the time my work was published, in only two instances had the new operation been adopted, and the artery tied on the distal side of an aneurism, when large branches intervened between the ligature and the sac; and an opportunity had not occurred of ascertaining the effects of such an operation by examination after death.

No apology, therefore, appears to me necessary for taking this early opportunity of publishing the mode of termination, and the appearances observed after death, in the case of Mrs. Denmark; a case which, whether we consider the importance of the pathological principles which it has been the medium of developing, or the operation performed for her relief, has created a more intense interest than perhaps any operation of modern times.

In the *Lancet* of Sept. 9, 1828, more than twelve months ago, I published a report, being the fourth after the operation, and then stated—

“The following is the present state of the patient (Aug. 8, 1828):—She is more reduced in point of flesh than at the period of the last report; but this has evidently been owing to the attack

of bronchitis, and the severe measures to which she has been subject, (*subjected?*) for within the last six weeks she has regained her former appetite in a wonderful manner; the difficulty of respiration has greatly diminished; so much so, that she can now sleep in the natural position, and she is entirely free from the dreadful sensation of threatening suffocation. No tumor is perceptible in the situation of the aneurism, but an unnatural feeling of hardness can be perceived at the root of the neck, immediately above the sternum, arising, no doubt, from a condensation of the aneurismal tumor. The right carotid artery still pulsates, although not so strongly as the left; its pulsation corresponds with that of the heart, but its branch, the temporal artery, affords no indication of the circulation of blood; the right radial artery beats with about half the strength of the left. She suffers none of those pains in the regions of the neck, shoulder, and back; nor has she, for a long time, experienced any of those severe head-aches which formerly gave her so much uneasiness. The œdema of the feet has entirely disappeared, and she takes exercise in the open air daily."

For some time after the date of this report no change took place in Mrs. Denmark's state. She occasionally suffered from severe attacks of dyspnœa, which were generally speedily relieved by blood-letting. In about three months, however, a swelling was perceived in the space immediately above the sternum, and a tumor arose, which, as it advanced, occupied the centre of the neck, and covered the inferior portion of the trachea.

In the course of some months afterwards, a second tumor made its appearance, occupying the site of the root of the right carotid artery, and extending up the right side of the neck. These two newly-formed swellings were so intermingled at their base with the firm and consolidated remains of the original aneurism, that the whole formed one formidable mass, the limits of which could not be ascertained by the touch, and could only be a matter of conjecture.

Many opinions were hazarded as to the origin and site of this tumor; my own opinion, however, of the seat of the disease remained unaltered; and I now deliberated on the propriety

of tying the right carotid artery. It must be recollected that when I first contemplated tying the subclavian in this case, I did so from the firm conviction that nature had already obliterated the right carotid, that vessel having long ceased to pulsate; and as sufficient time had elapsed, from the application of the ligature to the subclavian artery, to allow coagulation in the tumor to take place, to a certain extent, before the channel through the right carotid was re-opened, when the circulation through that vessel was observed on the ninth day after the operation to be imperfectly restored, it was a most unexpected and unpromising occurrence; nevertheless the tumor continued to decrease, the distressing symptoms to disappear, and the patient's health to improve, up to the publication of my last report.

However firmly I adhered to the original opinion I had formed of the seat of this aneurism, there were some surgeons in whose discrimination and judgment I had the greatest confidence, who were dubious of the precise seat of the tumor. Such doubts, in a case of so difficult diagnosis, together with a consideration of the severity and danger of tying the carotid artery, even under the most favourable circumstances, were to me sufficient reasons for not performing that operation. I therefore endeavoured to prolong the patient's life, and, if possible, to mitigate the severity of the symptoms, by a rigid system of depletion.

The aneurism now continued to enlarge, and increased in bulk till the beginning of January last, when it attained its greatest magnitude.

Since that time very little alteration in the state of the tumor had taken place; the sternal portion enlarged a little, the respiration and deglutition were both somewhat affected, and the former considerably so at times, from a copious secretion of watery mucus into the bronchiæ. The patient's general health varied: she was sometimes comfortable and cheerful, at others languid and feeble: the appetite always continued good. About two months ago, general anasarca came on; but when it had increased so as to considerably distend the integuments, the fluid drained off from an opening in the inferior extremities. The disease recurred, but to no great extent. During this time she

became weaker, and at last was affected with a violent diarrhœa; which, although checked soon after its accession, reduced her so much, that she gradually became more and more exhausted, and expired on Friday last, the 13th inst.

Dissection.—The bulk of the aneurismal swelling had not diminished after death. On removing the integument of the neck, the tumor occupied the central space between the two sternomastoid muscles, the sternal portions of each of these muscles passing over the side of the tumor. The mass may be said to have been composed of three divisions: one sternal, arising immediately above the sternum; another passed upwards along the trachea; and the third was the original portion of the aneurism, which had consolidated by the operation. These three masses formed, in conjunction, a lobulated tumor larger than a turkey's egg. It had adhered firmly to the sternum, and had caused the absorption of a portion of that bone.

The aneurismal *tumor*, as might have been expected, from no diminution having taken place in its bulk after death, felt like a firm fleshy mass. On laying it open longitudinally, it appeared nearly solid. The coats of the tumor presented the usual appearance observed in true aneurism; the clavicular and tracheal portions of the sac were filled with firm coagulum, the cavity of the aneurism being chiefly limited to the division between the sternal and tracheal portions, and was about the size of a walnut. The layers of the coagulum were remarkably firm, and of a pale colour, being of a softer consistence and darker colour as they approached the boundaries of the aneurismal cavity.

Heart.—The parietes of this organ were thinner and softer than natural, but no other change of structure could be perceived.

The only change to be perceived in the *aorta* was that the coats had a deeper tinge of yellow than natural, rather thicker, and had a few small points of ossification. The size of the artery natural.

On cutting into the *innominate* from the *aorta*, the aneurism was found to have originally extended from its origin to its bifurcation.

The *subclavian artery* is divided at the place where the ligature had been

applied, and both the cardiac and distal orifices are contracted, and the sides of the vessel coalesce, and adhere firmly together, so that a probe cannot be passed further along the canal than to within about a quarter of an inch of the distal end of the divided vessel.

The right carotid.—Pervious, and quite healthy.

The Lungs.—Healthy; the lining of the bronchiæ rather redder than natural, and contained a preternatural quantity of mucus*.

The result of this dissection leads to some important conclusions. In the first place, it establishes the correctness of the *diagnosis*; and, further, it proves that if, in those cases wherein the physiological and pathological principles I have advocated can lead to a practical application, success, according to the new mode of treatment, may be confidently anticipated. It also proves, that to whatsoever degree the progress of aneurismal swelling of the *innominate* may be arrested in its growth, by the closure of the *subclavian*, yet the current of the circulation through the *carotid* will be sufficiently strong to extend the walls of the vessel in the direction of that current.

I have in another place demonstrated by dissection, that the closure of the *carotid* is not in itself sufficient to prevent the increase of an aneurism of the *innominate*, a fact which was illustrated in the case of Gordon†, wherein the *carotid* was obstructed by a spontaneous process of cure; yet the aneurism continued slowly to enlarge, and that portion of the tumor contiguous to the *carotid*, as in Mrs. D.'s case contiguous to the *subclavian*, became consolidated.

In my work on aneurism, I have taken some pains to point out a rational means of forming correct *diagnoses*, founded on anatomy and well-known principles of pathology, by which surgeons may, in future, be enabled to distinguish the site of aneurismal swellings at the root of the neck. To a want of this knowledge, and in consequence of no author having even attempted to supply so important a deficiency, may be attributed the distressing and fatal blunders of many eminent surgeons. The details of this case af-

* The preparation will be deposited in the Museum of the College of Surgeons.

† Vide work on Aneurism.

ford satisfactory evidence of the soundness of these diagnostic precepts*.

Charles-Street, St. James's-Square,
Sept. 16, 1829.

CASES IN SURGERY,

TREATED BY

JAMES BOYLE, ESQ.

Colonial Surgeon of Sierra Leone,

CASE I.

Frost-bite—Amputation of both Legs.

JEM ANTONIO, a native of Prince's Island, and a passenger in the brig Martha, was brought into the port of Sierra Leone for medical assistance on the 3d of March last, he having been severely frost-bitten in both feet on quitting Liverpool some weeks previously.

On examining the injured parts, the most abominable fetor was encountered. The whole of the tendons, with the exception of the tendo-Achilles of the right limb, and most of the connecting ligaments of the ankle-joints, were destroyed. The feet were literally dropping off: the left was held on only by a very small portion of ligament, and a piece of what seamen call "rope-yarn," or "lan-yard," passed round the knee, and attached to the great toe. There was no circulation beneath the ankle-joints, all communicating vessels having been destroyed; and the feet, greatly wasted, were hard as wood, exhibiting a shining mummified appearance. The patient was otherwise in good health; nor was he low-spirited.

Amputation was at once proposed, to which he readily assented, and both legs were accordingly removed the following day, by circular incision, at the usual situation below the knee. The patient bore the operations manfully, and, by the assistance of an anodyne draught, had a few hours sleep during the night.

After the operation not one bad symptom set in: the ligatures came away in a reasonable time, and the stumps were completely healed in four weeks from that period. Soon after this, the poor fellow had an opportunity of proceeding to his friends at Prince's Island, by H. M. ship Medina; and, although minus the legs, Jem was in excellent health and spirits.

CASE II.

Extensive Lacerated Wounds.

Thomas Richards, a powerful liberated African, aged about 28 years, was brought to the Colonial Pharmacy, on the 20th March, 1829, for medical assistance, he having been severely wounded by the bursting of a musket, when firing the same with the intention of destroying himself. Richards was then greatly intoxicated, and required force to be induced to submit to an examination of his wounds. As blood was flowing freely from the left thigh, that limb was examined first, and a tremendously extensive wound presented thereon; its length being nine inches, and its breadth nearly seven: all the enveloping fascia to the above extent was removed. Part of the sartorius was entirely carried away, and smaller portions of the rectus and vastus internus, with all surrounding cellular membrane, were also removed, leaving quite naked the femoral artery and vein. The wound, which was every where studded with particles of powder, was less ragged than might be expected from its extent, and the nature of its cause; a small portion of common integument only requiring removal with the knife.

Two broad straps of adhesive plaister were placed round the limb, one at each extremity of the wound, for the purpose of approximating, as nearly as possible, its boundaries, and of thus affording the separated muscles the means of regaining their natural position. The centre of the wound was covered by a digestive dressing, and an eighteen-tailed bandage was passed, to give additional security.

Attention was next drawn to the right hand, the thumb and middle finger of which were injured as follows:—Thumb shot away, with the exception of the head of the first phalanx. It was now amputated at its metacarpal joint. Middle finger torn or broken into numerous fragments as far as its central joint. It also was amputated.

The integuments of the chest were loaded with powder, as were also those of the arm of the left side; and the centre of the sternum had a small circular wound, extending to the bone, corresponding to the head of the ramrod of the gun employed by the patient. The serotum on the right side was lacerated to the extent of a quarter of an inch, and the glans penis were excoriated

* Lancet, Sept. 19.

all round, evidently by the explosion. Digestive dressing was applied to the wound over the sternum; a mixture of liquor plumbi acet. with sweet oil, to the scorched and inflamed parts; and a saturnine lotion to the thigh. A dose of castor oil was administered immediately after putting him to bed, and an aperient febrifuge mixture was directed to be given at intervals during the night.

Morning of the 21st.—No sleep during the night. Bowels not moved; pulse 120; tongue slightly furred, with thirst, and heat of skin. The patient rational.

Submur. Hyd. Ext. Colocynth. c. aa. gr. v.
Ol. Croton gt. j. M. ft. pil. ij. statim
sumend.

Cont. mistura.

22d.—Had several evacuations; pulse fuller and more pliable. The outer dressings were removed, and the mixture was continued.

23d.—Removed all the dressings except the circular straps round the thigh; the wound gave exit to a dark foetid matter, and was, in consequence, after washing, dusted over with finely powdered camphor, and dressed as before. The amputation wounds were partially united and clean; but the scorched surfaces on the chest and arm were completely destroyed, the suppurative process was established, and the patient, though rational, was greatly excited and irritable. The dressing and mixture continued, with the addition of a night draught, composed of Liquor Opii sedativus, Tr. Hyoscyami, and Camphor mixture.

From this time up to the 5th of April all went on well. He now complained of difficult deglutition, with pain and rigidity in the muscles of the lower jaw. Lock-jaw being apprehended, opium, in conjunction with other antispasmodics, were liberally administered: the muscles of the face soon became free, but considerable derangement of the bowels followed, which, with the treatment necessarily adopted, greatly reduced him.

On the 12th, again his health was much improved. The scrotum and penis were both cicatrised; new skin had formed over the chest and arm; the stump of the finger was healed; that of the thumb nearly so; and the wound in the thigh greatly lessened in size, and quite healthy in appearance.

The patient was now sent to a neigh-

bouring village for change of air, and there he soon recovered, with a little limp only in walking.

CASE III.

Lacerated Wound from the Bite of a Shark.

Thomas Bremer, a seaman of the ship St. Andrew, was brought to Freetown for medical assistance, from the river Sierra Leone, a distance of about 25 miles, on the 20th of March last, having been severely bitten by a shark whilst dabbling his lower limbs in the water from a stage alongside.

On examination I found a very extensive wound situated posteriorly on the above-named extremity; this had a superficial commencement at the inner side between the buttocks, running to the lower and central point of the insertion of the gluteus maximus; here the animal's teeth having penetrated deeply, were carried 11 inches directly downwards, including a space of about seven inches in breadth. A large portion of the biceps flexor eruris was removed, as were also considerable portions of the vasti. The wound had bled freely at first; but all the hæmorrhage had now ceased, nor did any but venous vessels appear to have been divided. A few pieces of ragged integument only required removal: this done, the part was covered with soft dressing and a pledget of fine tow, securing all by an eighteen-tailed bandage.

The bowels were kept open by a mild purgative mixture, and a light diet was enjoined during the first few days.

On the day following the dressings were removed; a moderate and particularly healthy discharge had then established itself, and the work of regeneration had already commenced. From this time the wound was dressed simply, but regularly, every day, and did not require any change of application up to the 25th of April, the period of his quitting for England, when its boundaries were reduced to half their original size, the centre being nearly filled up on a level with its sides. A little wine, and a more full and nutritious diet had now for some time been allowed, and was directed to be continued. This patient was throughout in good health and spirits.

CASE IV.

Injury of the Chest—Emphysema.

On the 26th of March, 1829, Thos.

Rigby, carpenter of the ship *Alexander*, of Belfast, Ireland, fell into the hold, his breast striking against a log of timber. He was brought to Freetown the following morning for medical assistance, and on my seeing him, he complained of difficulty of breathing, and severe pains in the neck and right side of the chest. These parts were emphysematous in the greatest degree, the neck in particular being enormously swollen, with much crepitus and discolouration of skin. The same condition, but not in an equal degree, was to be traced as far as the right knee. The ribs were all very minutely examined, and although pain was felt about the centre of the sixth true rib of the injured side, yet no fracture could be detected, nor was there any pricking sensation experienced on making a deep inspiration.

An incision one inch long, and extending to the cellular texture, was made over the superior part of the sternum, which gave exit to a small quantity of venous blood, thrown into bubbles by a considerable quantity of air that was emitted at the same time. An antiphlogistic regimen, and a purgative mixture, were directed.

27th.—Great relief was experienced from the treatment of the previous day. The swelling was considerably lessened, but a large quantity of air, with crepitus, still remained; another opening was therefore made, which was attended with the like good effects.

28th.—The patient expresses himself much better, but there is yet air under the skin. The application of the scarificator and a cupping-glass now suggested themselves as being an improvement upon the common practice of merely dividing the skin—first, because numerous incisions could be made by one stroke of the instrument; and, secondly, because the air would necessarily escape rapidly to supply the vacuum in the glass.

This idea was accordingly carried into practice, and the glass acted as was anticipated, but was soon thrown from the surface by the current of air into it. The reapplication of the glass was practised two or three times altogether, with such perfect success, that no air was left remaining, nor did it collect again.

It is perhaps worthy of remark, as regards the probability of fracture in the first instance, that pain again re-

turned in its original situation, about the centre of the sixth rib, in a rather greater degree than during the emphysematous condition of the surrounding parts; this, however, was quickly removed by the application of a few leeches, and the patient was discharged a few days after, in perfect health.

[Since writing the above, I have been informed that the patient, whilst at work with his head inclined downwards, and apparently in good health, suddenly fell, and expired.]

SUBCARBONATE OF IRON IN CHRONIC RHEUMATISM.

To the Editor of the London Medical Gazette.

York, Sept. 5th, 1829.

SIR,

PERMIT me through the medium of your pages to call the attention of the profession to the use of the subcarbonate of iron in chronic rheumatism; I have been in the habit of administering it frequently for the last five years, and can aver that its exhibition has produced more benefit, in a fair average of cases, than any other remedy I have trusted to. How often this complaint may be connected with, or be mistaken for neuralgia, I will not at present venture to discuss, but I thought it a fair induction from Mr. Hutchinson's mode of treating tic douloureux to endeavour to extend its use to other painful disorders. This remedy is only slightly mentioned by Dr. Scudamore, and not at all, as far as I am aware, by other writers. I therefore hope this brief communication may not be entirely useless. Lately, I have always commenced with half-drachm doses, every six hours.

Your obedient servant,

H. S. BELCOMBE, M.D.

LEAVING THE BODY FOR DIS- SECTION.

To the Editor of the London Medical Gazette.

SIR,

YOUR pages are too valuable to be wasted in fruitless controversy, especially on points which involve more of per-

sonal feeling than of public interest. The letter of Philalethes however, in your last number, calls for some reply ; and as I mean to be brief in my remarks on it, a small space will, I trust, suffice for their insertion.

Since your correspondent has thought proper to fix on a special transaction the application of certain passages in my "Address," I have no hesitation in avowing that the procedure which he mentions was that which I had in mind when I wrote the passages in question ; that, in the notice which I have taken of it, I have fallen into error, I am yet unconvinced.

Your correspondent, after a preamble sufficiently objurgatory, declares that the document referred to "is not a solemn instrument, or bond, or bequest." I had simply named it a solemn declaration, and, on a careful reperusal, I am unable to find expressions which can designate it more accurately. For sake both of perspicuity and fairness, suffer me, Sir, to quote the passage in the "Address" in which I have noticed it ; as your correspondent has, through means of Italics, which I can only understand as intended to mark my words, imputed to me expressions which I have never used. My words are—"Again, it has been tauntingly urged upon the advocates of anatomy to consign their own bodies to dissection, and thus prove their zeal, public spirit, and disinterestedness : I blush to say that this disingenuous and silly call has been answered, and that, in one part of the kingdom, several have been misled into executing a solemn declaration to this effect." In calling it a solemn declaration, I believe I am borne out by the document itself, in which the subscribers deliberately and solemnly express their desire, &c. ; and, in having regarded it in the light of a testamentary bequest, I am not singular, for it has been generally, if not universally, so considered. That you deemed it so yourself, Sir, is sufficiently obvious from the notice prefixed to the article in the Gazette which contains it—namely, "Example of *leaving* the body for dissection." But I go further, Sir ; for, that it was so regarded by the subscribers themselves, and intended to convey this impression, I can have no doubt, although the technical form and legal force of a last testament were not given : indeed, the former could not

well be used, nor could the latter be imparted. If not to all intents and purposes a testamentary bequest, of what possible avail was this document ; or can it be regarded otherwise than a mere nullity, affecting to do what the parties never intended?—and if it was to be of any force, then do I still consider it worthy of all the blame which I have attached to it. The good intention of the subscribing parties I do not doubt, nor have I impugned it. Of the procedure itself, my impressions, notwithstanding the pains which Philalethes has taken to correct them, remain unchanged. I still regard it, however laudable the intention of the subscribers, as evincing more of empty profession than of serious design or efficient purpose. Limited as your correspondent represents this device (for such it virtually is) by "the consent of friends," and by "all due regard of feelings and prepossessions," what practical effect could ever result from it ; and, of the three hundred subscribers, how many bodies would ever become the subjects of dissection ? I ask not Philalethes to answer this question : the true reply is at once suggested by the well-known feelings of the human heart, and no modification of this reply could alter the views which I take of the whole transaction.

Philalethes further asserts, that this declaration had no reference to the taunt which called on medical men to devote their own bodies to dissection, and that it expressed no design of supplying with such bodies the anatomical schools. However Philalethes, and those immediately concerned, may have judged, it was impossible for others not to connect this declaration with the taunts with which the diurnal press at that time actually teemed, and which were reiterated *usque ad nauseam*. These called directly on medical men to bequeath their own bodies for dissection, and thus supply the alleged wants of the anatomical schools. The declaration in question appeared, and, timed as it was, it was impossible not to regard it as an answer to the call. So general was this impression, that even the disclaimer of Philalethes will hardly succeed in effacing it.

It is not without pain, Sir, that I have thus reflected on a transaction with which so many liberal and enlightened men are connected, and which it would be far more grateful to me to praise

than to blame. Willingly would I have avoided this renewed discussion of it, which your correspondent has forced on me. My original allusion to it was slight, being barely what was necessary to furnish a foundation, in fact, for the strictures which I deemed it right to express. In these, my object was the general policy of such procedure, not the individual instance, nor the parties concerned. Personal offence I meant not to give, and if any has been taken I am sorry for it. My views were directed solely to the important question on which the legislature must soon deliberate; and my "Address" was intended to impart to our senators some more correct notions of its elements than they appear to have hitherto entertained. Should it serve this end, I shall be easily consoled for the reproaches of your correspondent. I willingly admit, that the spirit which dictated the declaration merits every praise; but the measure itself, on the fullest and most mature consideration of the subject, I cannot commend.—I am, Sir, &c.

A FRIEND OF
SCIENCE AND HUMANITY.

Sept. 6th, 1829.

EXPERIMENTS ON THE CORTEX CINCHONÆ CORDIFOLIÆ.

BY MR. BATTLE.

HAVING recently been engaged in a course of experiments on yellow bark, with a view to a more correct and complete analysis of it than has yet fallen under my observation, I feel justified, by the success of my labours, in submitting to the profession the following detail of my operations, for the two-fold purpose of inviting their attention, generally, to the importance of pharmaceutical analysis, as subservient to the improvement of the materia medica; and particularly, to the very interesting results of my present investigation into the nature and properties of bark, the actual separation of its constituent principles, and their power of combination with other substances; all with reference to the ulterior investigation of the relative medicinal virtues of the several simples and compounds, that will successively pass under our review in the different stages of this analytical process.

1.—*Macération*.—Ten pounds (apothecaries' weight) of fine flat yellow bark, having been macerated for five hours in several gallons of distilled water, at a temperature of 150° Fahr. the infusion was of a bright yellowish red colour, fragrant smell, and very bitter taste. When cooled to 110°, it became opaque, with a thick pellicle on its surface. On being exposed in the evaporating dish to a continued temperature of 150°, or thereabouts, when condensed to about a fourth of the original quantity it began to deposit a dark tough substance, which gradually increased as evaporation proceeded, until the fluid approached the consistence of syrup, when the deposit was withdrawn, and the fluid suffered to cool to 110°. At this point it assumed the appearance, as if a quantity of milk had been diffused through it; and four or five pints of distilled water being suddenly plunged into it, the whole became disturbed; and an immediate and copious precipitation ensued, of matter in the form of masses, at first tough and waxy to the feel, but readily yielding to the pressure of the hand, and when separated from the fluid, drying very quickly, and pulverizing almost spontaneously. The fluid, after this precipitation, was beautifully bright, very fragrant, and exceedingly bitter; and, being slowly condensed, formed a semi-opaque extract,

The weight of which	1 lb. 8 oz. 4 dr. 34 gr.			
was.....				
Ditto of deposit and	0 4 0 30			
precipitate together				
Total ...	2	0	5	4

The extract was next diffused in distilled water, and was most easily dissolved, forming a fine rich mixture, semi-transparent, of a beautiful yellow, bitter and aromatic. Heat (130°) being applied, and dilute sulphuric acid added to a degree of pungency, the mixture was much brightened: after some hours it was saturated with lime. The sulphate (which was of a bright yellow) being washed and dried, was submitted to boiling alcohol; and the spirit being evaporated, the result was a beautiful brown crystalline mass, strongly partaking both of the smell and flavour of bark. The combined matter of the deposit and precipitate was then placed in sub-dilute sulphuric acid. The solution was of a deep yellow, semi-trans-

parent, and very bitter, but at the same time pleasant to the taste. This having been decanted, and more sub-dilute sulphuric acid added, and a gentle heat applied, the second solution was in all respects similar to the first. The two solutions being then mixed together, and saturated with lime, the sulphate (of a pale reddish brown) was treated like the last, and with nearly similar effect. The residuum of the deposit and precipitate was then dissolved in successive portions of dilute sulphuric acid, until it ceased to impart the least bitter or bark flavour, and the several solutions being mixed together, and saturated with lime, the sulphate (which was quite white) was submitted to boiling alcohol, &c. precisely as the two former. At the last, the insoluble part of the deposit and precipitate being washed and dried, weighed

	1 oz. 5 dr. 54 gr.		
The acid solutions together having imbibed..	2	2	40
Total...	4	0	34

The insoluble matter was then boiled in alcohol for twenty minutes. The spirit was both deeply tinged and flavoured. The residuum was again boiled in successive portions of alcohol, until all that was soluble was taken up; when the remaining insoluble part being washed and dried, weighed

	1 oz. 0 dr. 35 gr.		
The spirituous solutions together having imbibed	0	5	19
Total...	1	5	54

These solutions were then mixed together, and deposited (when cold) a copious precipitate, which being exposed to sub-dilute sulphuric acid, instantly disappeared. The acid mixture being further diluted with water, and saturated with lime, the sulphate fell instantly to the bottom, leaving suspended a gelatinous matter, which gradually subsided, and remained upon the surface of the lime in the filter. The sulphate dried of a bright yellow, and was treated like all the former. The spirituous solutions, after parting with the precipitate mentioned above, were mixed

ed with sulphuric acid to a pleasant sourness, and retained their transparency unaltered. The mixture was saturated with lime, and the sulphate (which dried of a deep red, tinged with yellow) was treated as before. The supernatant mixture was quite bright, of a deep port-wine colour, and astringent to the taste. Three pints of distilled water being plunged into it, the whole colouring matter was instantly thrown down, and being collected and dried, weighed 1 drachm 28 grains*.

II. *Maceration*.—The whole process that has now been described, was repeated from beginning to end with the residual bark. It would be tedious and unnecessary to detail the operations at length, the results being all very similar to the first, agreeing perfectly in kind, and differing only in degree, inferior (as might have been expected) both in quality and quantity to those of the first series of experiments. The only difference observable in the second instance was, that a yellow, powdery efflorescence (1 dr. 28 gr.) floated on the surface of the watery infusion, and that there was little or no deposit during evaporation, till after the plunge of distilled water, when the precipitation was instant and copious, as before.

Weight of extract,	4 oz.	2 dr.	42 gr.
Ditto precipitate,	2	3	12
Total	6	5	54

III. and IV. *Macerations*.—The residual bark was again macerated in distilled water, a third and a fourth time, with this only difference in the present case, that the two infusions being both extremely weak, were mixed together, and the compound operated upon in a manner precisely similar to I. and II., and with results still inferior to both in quality and quantity.

Weight of extract,	2 oz.	5 dr.	4 gr.
Ditto precipitate,	0	7	0
Total	3	4	4

V. *Decoctions*.—The bark, after the four preceding macerations, was next boiled for many hours in several successive portions of distilled water. All the decoctions were mixed together, and condensed by evaporation to a state somewhat resembling mucilage in ap-

* Twenty grains of this imparted to sulphuric acid, two grains and a half; to boiling alcohol, eleven grains.

pearance, when after the plunge of distilled water, as in former experiments, precipitation ensued to the extent of

	0 oz.	5 dr.	32 gr.
Extract obtained from the } remaining liquor	4	6	45
Total ...	5	4	17

VI. *Papin's Digester*.—The *residual bark* was then placed in distilled water in Papin's digester, and kept at a high temperature for several hours. The water was pressed off and evaporated. It had little, if any, flavour of bark, nor was the plunge of distilled water followed in this instance by any precipitation, as it was in all the former experiments. The extractive matter (Wt. 3 dr. 30 gr.) was tough, of a dark colour, and an exceedingly disagreeable rough saltish taste. This being dissolved in cold water, formed a mucilaginous mixture of a dirty sickly brown colour, and without the least flavour of bark. Dilute sulphuric acid (to pleasant sourness) being added, the appearance remained unchanged; and the mixture being saturated with lime, and the sulphate (dirty looking) submitted to boiling alcohol, as in former experiments, there was no result of crystalline matter.

VII. *Acid Decoction*.—The remaining *woody fibre* having been thoroughly washed and dried, was (lastly) boiled for several hours in many gallons of distilled water mixed with sulphuric acid, and then left to macerate for fourteen days. This last decoction was *intensely bitter*, and what is yet more remarkable, the fibre itself, at the last possessed so much bitterness, that it was found scarcely possible to deprive it entirely of flavour, though repeatedly deluged with water during a whole day. The decoction having been saturated with lime, the sulphate was quite white, and the supernatant liquid slightly green. The sulphate was boiled in half a gallon of alcohol, and imparted more bitterness to the spirit than any of the preceding separations of lime had done. The spirit when condensed to four ounces, was slightly tinged with brown, and strongly flavoured; and sulphuric acid being added, till litmus paper indicated a trifling excess, and the mixture being set at rest, after some hours crystals began to form about the surface of the fluid, in contact with the vessel, of a much darker colour, but

the same aromatic odour, as the fluid; and when the process of crystallization had entirely ceased, the fluid was poured off, and was still *very bitter*, and slightly alkaline. Having been then neutralized with the least drop of acid from the end of a glass rod, and no more crystals being seen to form, the fluid was evaporated to dryness, leaving a transparent brown substance resembling emetine, which quickly attracted moisture.

VIII. All the different *results* of these experiments, mentioned in order, have been arranged and deposited for the inspection of the curious in the museum of the academy, London Ophthalmic Infirmary, Moorfields, where these experiments were first conducted, and where they will be again repeated, if such be the desire of the profession, for the verification of the particulars above described.

I purposely forbear at this time to state the conclusions which I think may fairly be drawn from these experiments, or to explain more fully the particular views with which they were commenced, being impelled to this silence at present, partly by my unwillingness to obtrude my opinions upon those who are so well able to form their own conclusions from the facts before them, partly by my sincere wish and request to be favoured with the unbiassed judgments of others, in relation to all or any of the particulars that have been now presented to their notice; and lastly, and above all, by my humble, yet anxious hope, that the striking novelty and interest of my present communication may have a tendency to excite increased attention to the labours of chemical analysis, to awaken a spirit of inquiry favourable to future research in matters of science, respecting which much ignorance (and its usual effect, much deception) at present prevails, and thus ultimately to lead, by necessary consequence, to important improvements both in the practice of medicine and pharmacy.

(JULY 1829) * P.S.—Since the date of the above, I have continued my experiments on yellow bark on a large scale, and in a variety of forms; and have

* The preceding part was published in Dr. Farre's Journal.

thus been enabled to verify the former results, and to confirm to my own satisfaction, both the principles upon which those experiments were founded, and the conclusions which I am disposed to draw from them. The issue of my investigation into this important subject is briefly this:—Analysis has failed in its attempts to discover wherein the peculiar and essential principles of bark reside; and chemistry can as yet boast no preparation of this valuable medicine which, combining *all* its active properties, can fairly claim to be received, or can be received with confidence, as an efficient representative of this powerful agent. The boasted efficacy of the sulphate of quinine might, from the very nature of the compound, have been reasonably doubted, even had success more uniformly attended its adoption in medical practice; but the repeated instances of its failure, recorded by experience, are sufficient to abate our confidence in its virtues, and to evince the want of a still more efficient preparation.

To supply this desideratum in pharmacy, I invite the attention of the medical department to a new preparation, which I have succeeded in obtaining, by a process similar to that of the *Liquor Opii Sedativus*, and which I propose to designate by the name of "*LIQUOR CINCHONÆ CORDI-FOLIÆ*," being a concentration of all the essential properties (with the aroma) of bark, and proving of equal efficacy with the exhibition of bark in substance. It has been submitted to the test of experience by the highest medical authorities in London, and always with eminent success; and I think myself justified, by the numerous and decisive testimonies in its favour, in submitting it with confidence to the notice of the profession, as a valuable production of pharmaceutical art, and an important addition to the *materia medica*.

FLEXIBLE STETHOSCOPE.

To the Editor of the London Medical Gazette.

SIR,

HAVING been unexpectedly obliged to postpone for some days sending the drawing, and report of the effects

of the stethoscope, with which both ears can be simultaneously employed, I shall feel much obliged if you will in your next number have the goodness to publish the following brief notice of the comparative utility of the inflexible and the flexible stethoscopes.

In acute thoracic diseases, and in chronic cases, in which pain is excited by pressure or motion, it may perhaps be predicated that the flexible stethoscope should, with few, if any exceptions, be employed. But in other cases the original stethoscope, that is, the lowest tube of the flexible instrument to which the ear-piece with a female screw can be united, should generally, though perhaps not always, be preferred. This does not imply that the angular joint injures the transmission of sound. It means only, that proximity, which is gained by using only the lowest tube, seems to be exclusively necessary for accurately hearing certain low thoracic sounds. And it may be allowable to state, that other gentlemen, as well as myself, have concluded, after accurate examinations, that the flexible stethoscope conveyed in some cases louder sounds than even a good instrument of the original kind. If, therefore, the tube of a flexible stethoscope were not longer than the tube of the original instrument, it may perhaps be concluded that sounds conveyed through the former would not, in any case, suffer by transmission. The flexible is only the original instrument, modified as little as convenience requires; and if well made stethoscopes be employed, the writer will cheerfully await the decision of every judicious and candid auscultator.

To avoid disappointment in the workmanship, he begs to offer a few remarks. The instrument being held perpendicularly, the horizontal bore of the two pieces that compose the flexible joint should not proceed farther than the parts where it should meet the perpendicular bores that are continuous with those in each limb of the cylinder. The female screws should not injure the horizontal bore. To render the joints airtight, a thin portion of cork, bored in the centre with the same instrument with which the tube was bored, should be introduced between the extremities of the male and female screws, and between the extremities of the "tenants," about which, also, cork or cotton should be coiled. Attention to these directions

will little increase the trouble of the turner. I have by experiment ascertained that the sounds must be injured if the continuity of the bore of the instrument be interrupted by chasms. The purchaser should therefore examine the stethoscope in these respects before the ferrules be screwed to the joints. The diameter of the lower extremity might be advantageously less than an inch and a half, the latter being too great to be very readily adjusted to the irregular surfaces of portions of the chest, especially of young phthisical patients.

Allow me to correct an unintentional inaccuracy with respect to the description of the ear-piece. Various kinds have been tried, but that in ordinary use appears to be the best. The central portion should be moderately elevated, so as to approach but not to touch the concha. The circumference should press the helix. I expected that the angular and moveable ivory part, intended to approach the meatus auditorius externus, would have improved the conveyance of the sound; but that which I tried has not answered; probably because the diameter of its bore was less than the diameter of the bore of the instrument; or, because the substance deviated from the homogeneousness of the internal part of the tube. I expected before the transmission of the former letter to have had an opportunity of trying the effect of this portion, but did not obtain it till too late; and it escaped my memory to state that I was only about to try the effect of such a portion. The instrument, however, answers well without it.

I remain, Sir,

Your most obedient servant,

NICHOLAS P. COMINS.

P.S.—Permit me to observe that in the wood-cuts with which you were so kind as to illustrate my letter, (see Gaz. p. 427) the tenants of the joints (*c*, *h*) were incorrectly represented tapering, and somewhat like screws. The best form is like the tenants of flutes. I shall on another occasion trouble you with a description of an ear-trumpet; with which, like the stethoscope alluded to in the commencement of this letter, both ears can be simultaneously employed.

Edinburgh, Sept. 17, 1829.

ANALYSES OF BRITISH MEDICAL JOURNALS.

PROVINCIAL MEDICAL GAZETTE.

No. II. July, 1829.

[Concluded from page 497.]

Some Account of the Progress and fatal Termination of a Case of Cancer of the Stomach. By CHARLES MAYO, Surgeon to the County Hospital, in Winchester.

A CATHOLIC priest, sixty-two years of age, of plethoric frame and sedentary habits, had long been subject to dyspepsia, with constipation; to which were added rheumatic pains of the limbs, and a "harshness" in the throat, with a relaxed state of the velum pendulum palati. He had much languor, and considerable dyspnœa. His pulse was 60, full and regular. These symptoms continued to increase during the summer, notwithstanding the use of various remedies, such as full bleeding, aperients, squill, astringent gargles, &c. At the end of July he went to France, where he remained for a month, and during this time recruited very much, recovering his appetite, as it appears "that the French cookery was more agreeable to his stomach." On his return he visited London, and took the benefit of Dr. Armstrong's advice, who prescribed the solution of chlorine, in doses of from 40 to 60 drops, three times a-day, the bowels being kept open by equal parts of blue pill and colocynth. He also directed a small quantity of blood to be taken from the arm occasionally.

No benefit having been derived from these means, the muriated tincture of iron was exhibited (Oct. 11), and afterwards (Nov. 13) the Mist. Ferri Comp. which last he continued to take till the middle of January, together with $\mathfrak{m}\mathfrak{x}$. of the black drop at night. Under this treatment he recovered so far as to give sanguine expectations of his restoration to health; but about the middle of February the loss of appetite and nausea returned, and on one occasion he vomited a large quantity of a brownish fluid, with an acid, offensive taste. An emetic, which was administered, produced no evacuation of any moment. He was now directed to take sulphate of quina, in doses of two grains, three

times a-day, which he did without benefit.

He became extremely weak, and complained much of pain in his throat and the back part of his neck. He vomited (March 15) nearly a wash-hand basin full of dark offensive matter like the former, and this symptom afterwards returned several times, his food being frequently rejected. "He had been frequently examined by pressure on the epigastrium and hypochondria, with a view to detect some suspected disease in the abdominal viscera, but without success. I now discovered a large pulsating tumor beneath, and a little to the left of, the ensiform cartilage, and pointed it out to Dr. Crawford and Mr. Lyford, who had been added to us in consultation. Various ideas suggested themselves to us as to the nature of the tumor, such as aneurism of the aorta, diseased liver, pancreas, &c. and we were inclined to suppose it may have some sort of cyst attached to it, and communicating with the stomach, as the source of the offensive fluid thrown up by vomiting. Pressure on the swelling gave little or no pain, neither did he suffer any at other times, except from the violence of the vomiting."

From this time he continued progressively to sink, and died April 9th. The following appearances presented themselves on dissection, which took place the day of his decease:—

"At five this afternoon I proceeded to lay open the cavities of the thorax and abdomen, assisted by Mr. Lyford and Dr. Crawford: the integuments were thick with fat; the omentum, spread over the intestines, was quite loaded with it, and, on raising the sternum, we found the mediastinum and pericardium were equally burthened with fat; the stomach was large and distended with air; the tumor was readily felt, but it was so enveloped with the fat of the great and lesser omentum, as to render it impossible to ascertain the nature of it till these were removed; it was then clearly seen to be connected with the pyloric extremity of the stomach, and, on removing this viscus, and laying it open, we found a carcinomatous enlargement of the pylorus, equal in size to a pint jug, loaded with fat externally, and presenting an ulcerated surface internally, with a highly vascular fungus protruding from it, of

a brain-like consistence: on making a section of the tumor, it exhibited a complete scirrhus texture, and, from its density and thickness, must have weighed nearly two pounds. A few ounces of the black fluid were contained in the stomach, and, no doubt, the ulcerated surface of the scirrhus must have been the source of this morbid secretion: the pulsatory motion of the tumor was, of course, communicated by the aorta, upon which it rested. The heart was fat, but its muscular structure thin and soft, so that it appeared smaller than the general bulk of the body would have led one to expect; the aorta, on the contrary, seemed larger than natural, but on splitting it down with scissors, the only morbid appearance was the large size of the celiac artery branching from it, and, around its origin, a deposit of bony matter. Probably the great size of this vessel, from whose branches the diseased mass must have been supplied, may account, in some measure, for the profuse secretion which seems to have been constantly poured into the stomach from the ulcerated and fungous surface; sanguineous exudation and sloughs broken down had probably imparted the dark colour and offensive odour to the ejected fluid: a considerable slough was drawn out from the orifice of the pylorus, through which the finger readily passed into the duodenum. The liver was studded with white tubercles, about the size of a hazel-nut, both on the surface and within its substance; the peritoneal surface of the diaphragm, contiguous to the liver and the tumor, was quite rough with minute granular tubercles. The bowels were nearly empty. The kidneys were healthy, but covered with an immense accumulation of fat, which extended down the loins into the pelvis and across to the mesentery, rendering it unusually thick.

"Mr. W. had retained his usual appearance of obesity till within the last month or six weeks, but since the frequent vomiting came on, he became rapidly emaciated. From these circumstances we may, perhaps, conclude that the scirrhus became ulcerated at this period, and that its fatal progress was much accelerated by frequent excitement in the act of vomiting. It may, perhaps, be worth while to observe, that Mr. W. was of a florid complexion, and that his mother died of cancer in the

breast, from which circumstance he always apprehended himself to have an hereditary tendency to that disease; and it may be curious to speculate, whether the rigid observance of the discipline of his religion may not have had some tendency to determine the morbid action to the stomach."

An interesting Case of Concussion of the Brain. By EDWARD PHILLIPS, M.D., Physician to the Winchester County Hospital.

The Rev. Dr. — and a friend were thrown out of a chaise: the latter escaped without injury, but the former struck the back part of his head against a hard bank. Dr. Phillips, who happened to be near the spot, hastened to him. He found the Rev. Dr. lying on the ground motionless; the eyes open, pupils contracted to a point, pulse not to be felt, and respiration suspended. He was considered to be dead by the other persons present. He was conveyed to a neighbouring public-house, and diligent friction applied to the chest, and small quantities of brandy and water introduced into the stomach.

"After persisting in the use of these means for about half an hour, he was so far recovered as to ask what we were doing to him, and, in a tone of disdain, requested to know, 'by what authority he was detained, like a prisoner, by persons whom he had never offended, and who were entire strangers to him.'" I informed him of the nature of the accident which had happened to him, and that we were using our best exertions to prevent any serious consequences that might result from it.

"He said; 'I have met with no accident: I must know better than you, and I am now as collected in my senses as I have ever been in my life.' His friend, the Rev. Mr. —, who was with him when he was thrown from the chaise, entered the room, and asked him how he was; he replied, 'I thank you, sir, for your inquiries, but I have not the honour of knowing you;' and though his friend reminded him of the conversation they had on the preceding day, as to the vicious nature of the horse which had been the cause of their being upset, he inflexibly maintained that he had never before seen his friend, and that he had received no fall or injury whatever.

"In this state of partial delusion he continued for nearly an hour, when a post-chaise, which I had ordered, arrived to convey him to Andover.

"It is unnecessary to detail the many curious and singular questions which were put to me by the Rev. Dr. — at the commencement of our short journey; and which I, for obvious reasons, answered as concisely as possible. After a short interval of silence, he suddenly addressed me, and said, 'I feel, sir, a violent pain in my wrists—what can be the cause of it?' Another pause took place, and he appeared absorbed in thought. He then, with considerable agitation, said, 'I have a confused recollection that I have had to manage an unruly horse, and the pain I feel in my wrists must have been occasioned by my efforts to stop him.' From this moment he gradually recollected all the circumstances which led to the unfortunate accident; and by the time we arrived at the inn at Andover, the functions of the mind were completely restored. He expressed his warmest gratitude for the care which had been taken of him, and was rejoiced to learn that his friend had escaped without suffering any material injury.

"Having got my patient in bed, and finding his pulse was become full and strong, I ordered him to be bled; a cathartic draught was given and repeated until the bowels had been freely evacuated. He now complained of a severe pain in the right side, and upon the surgeon's arrival and examining him, it was discovered that three ribs on that side were fractured. The usual bandage was applied. The aperient medicines were occasionally given, and a low diet enjoined, and so favourable were all the symptoms that he was determined on the third day to proceed on his journey home, a distance of thirty miles, which he accomplished, as I afterwards heard, in one day, without having suffered any particular inconvenience from so early a removal.

"This gentleman, about four years after the accident happened, called upon me. He was in perfect health, and assured me that he had not experienced the slightest affection of his head, and that his recovery had been both rapid and permanent."

The above case is very interesting, and conveys an important practical lesson with regard to blood-letting, which

is so frequently adopted, as a matter of course, after every such accident. Had this gentleman been bled, as, we are told, his friend anxiously desired, the probability is that he would not have recovered.

An analysis of the Bath and other mineral waters follow, which we pass by, to arrive at

Observations on the Use and Abuse of Pressure as a Surgical Remedy. By MR. W. J. WICKHAM, Surgeon to the Winchester Hospital.

Mr. Wickham considers the action of pressure under three distinct heads: first, as a means of suppressing hæmorrhage, and causing a temporary interruption of the circulation; secondly, as producing absorption; thirdly, as an adjuvant to other remedies in giving support to parts which require it.

“Pressure may be resorted to in the most desperate cases of hæmorrhage from a large branch of an artery or trunk, but the benefit to be derived from it will entirely depend on the manner in which it is applied. The proper exertion of compression in this case implies a correct knowledge of the course of the vessel which requires it, the selection of the most desirable spot on which it is to be used, and the fulfilment of that object alone, without injury to other parts. For the want of a correct knowledge of the course of the femoral artery, I have witnessed serious hæmorrhage during amputation, the circular pressure being applied with the greatest degree of force which the screw would allow of, but the compress which should have been applied over the artery, being placed away from its course.

“Within these few days, a case of wound of the posterior tibial artery, near the malleolus, was brought into our hospital. The patient had sustained very copious discharges of blood, and, I think, he could not have borne another jet from the vessel. The tourniquet had been applied over the posterior tibial artery above the wound, instead of the femoral, and but very inefficient pressure had been made on the bleeding wound. By this, though the blood did not issue from the upper extremity of the artery, yet the anastomosis afforded a large supply, by which the lower end bled to a very great amount. I immediately placed

ligatures on both ends of the artery, and secured it from further bleeding. Here, then, the tourniquet had been misapplied, and rendered inoperative on the bleeding artery; and the parts about the wound had been bruised and injured, by an ineffectual compression of ten days, during which time hæmorrhage was, from time to time, going on, being only arrested by the occasional formation of a coagulum, and returning whenever it was removed. The objects to be obtained in the securing the bleeding vessel are, 1st. to close the orifice from which the blood issues, and secondly, so to suppress the force of circulation in the vessel, as to prevent the removal of coagulum which forms around it. In all cases it is most desirable to put ligatures on an artery, if it can be discovered at the wound; but, in failure of this, which frequently happens, from the many difficulties occurring at these times—difficulties which are known only to those who have experienced them—the firm compression of the vessel may be resorted to. The part from which the blood flows should be covered with a firm compress, just large enough to prevent the further escape of blood, and be pressed against the most resisting part; *i. e.* the nearest bone. Upon this, larger compresses should be applied, so as to press the greatest force on the bleeding part, which should be gradually increased as the surrounding parts recede from the wound. Over this a bandage is to be applied, rolled lightly from the lower extremity of the limb, and, gradually increasing its tightness as it approaches the wound, is to be carried on some way above it. In addition to this, it is well to apply a tourniquet on the main vessel for a few hours, which lessens the force of pulsation at the wound, and aids the formation of the coagulum.

“In the lower extremity, the anterior tibial artery may be compressed without fear throughout its whole course; also the posterior tibial, as high as the middle of the leg; but, I think, its calibre is too large, higher, to be treated by compression only. In the upper extremity, I would not confide in pressure higher than the brachial artery at the bend of the elbow*.

I have several times observed very

* See the excellent observations by Mr. Smith, of Bristol, on the wound of that vessel, at the bend of the elbow.

serious effects, the consequence of ill-directed pressure, for the suppression of hæmorrhage from the temporal artery, where it has been opened in the common way of taking blood from that vessel. The cases have been of this nature: after opening the temporal artery, and abstracting the desired quantity of blood, a compress, much larger than the wound, has been placed over it, which, for a time, has succeeded in stopping the bleeding. After a few hours, perhaps, on exertion, or, from some other cause, hæmorrhage has come on, and, instead of making a more immediate pressure on the vessel, the same compress has been continued, and the bandage tightened to a great degree. This has, also, for a time, answered the purpose, but, on its becoming in the least loosened, bleeding has recurred, and, in this way, a large quantity of blood has been lost at different times, the pressure having been applied to the surrounding parts rather than to the wounded artery. The parts, by this, have suffered so much injury from the compression, that inflammation of an erysipelatous character has supervened, which has sometimes terminated fatally.

“Large veins are occasionally wounded, and furnish a very considerable quantity of blood, which may be suppressed by the application of forcible and well-exerted pressure.

“It will be considered that the veins are not so liable to secondary hæmorrhage as the arteries, whose pulsation is apt to force off the coagulum which may be formed; therefore will be more readily and completely secured by compression. In addition to this, where veins are wounded, it will be borne in mind, that pressure should be adopted, in preference, where it can be confided in, to ligature, from the dangerous consequences which often attend on the latter.”

With regard to the second application of pressure—namely, for the purpose of causing the absorption of newly deposited or diseased parts, it is necessary to keep in mind, that, if the pressure be adopted to a certain extent only, the action of the arteries is increased, and, instead of causing the removal of the part, an increase is the result; but if it be more firmly applied, so as to check arterial action, and impede the circulation through

them, absorption must follow. “Pressure operates in this ratio—in a slight degree, the arteries become stimulated, more blood is sent to the part, and deposit is the result; but if it be exerted to a greater degree, the blood-vessels are lessened in their calibres, and less blood circulates in the part: the absorbent vessels likewise, no doubt, in this case receive the stimulus, and become more active.”

The author proceeds to make some observations on the plan of treating cancer by pressure, as recommended by Mr. Young. The results of his experience are not favourable to the opinion that the disease can be thus removed; and this corresponds to the general inference which has been drawn by the profession. Mr. Wickham thus continues:—

“There is a species of ulcer, in the cure of which, pressure, if properly applied, has a very decided and satisfactory power—I mean the ulcer with callous edges. The usual denomination used for this sore, is that of *indolent*. The consequence of this term being employed, without reference to the cause of the sluggishness, is, that the sore is treated by stimulating means, which only prolong, rather than expedite, its cure. The state of the sore appears to me to be this: the surrounding parts are in a state of chronic inflammation; the weakened, distended, and overcharged vessels are constantly depositing fresh matter at the edges of the sore, by which a firm band is at last formed, so as effectually to prevent the further progress of these vessels towards the sore itself; the effect of which is, that the sore is ill supplied with blood, and absorption, that is, the ulcerative process, proceeds, without admitting of any check from stimuli. Pressure in this ulcer operates by compressing the vessels of the surrounding parts which supply the callous edges with fresh matter: thus, by reducing them to an ordinate and healthy action, the further deposit is put a stop to, and the edges become absorbed; the vessels then find their way to the sore, which now assumes a state of health and activity, and by it the process of healing is ultimately completed.”

This interesting paper is to be continued in another Number: the few other articles in the one before us, con-

sist chiefly of notices of public institutions, and are not of sufficient general interest to require notice.

LITHOTRITY.—MR. COSTELLO IN ANSWER TO MR. ALCOCK.

To the Editor of the London Medical Gazette.

SIR,

IN the Medical Gazette of Sept. 12, a "bill of indictment" is preferred against me. Amongst a great variety of other charges, which I shall notice as briefly as possible, I am reproached with having failed in two cases in which the lithotritic operation was attempted. I was not aware that any individual's private practice would be held up to the public in this country without such individual's consent, much less that it would be so unfairly misrepresented. Such courtesy accorded with the dignity of the medical profession, and was, as I erroneously supposed, until now its distinguishing characteristic.

The cases in question are set down (*totidem verbis*) as failures, and are placed in disadvantageous contrast with the successful one of M. Heurteloup. Happily, however, for lithotrity, this question must be dealt with by facts, not by mere assertions.

I should abstain from commenting on M. Heurteloup's case had it not been rendered necessary, to the full development of my defence. In the observations I am about to make, I shall, however, studiously forbear from any depreciation of its results.

My intention of introducing the method of Dr. Civiale into England, was known by my friends in Paris for a long time previous to my coming to London; this intention was warmly encouraged by a professional gentleman, the most distinguished ornament of English surgery; and amongst the very numerous recommendations, none was to have been more zealous or effective than that of which, as I had been over and over again assured, I should be the bearer to Mr. White. A correspondence was established between my friend and Mr. White, and a patient with stone was at length procured. Matters were in this posture when I learned, to my great

surprise, that my friend, supposing that my close connexion with M. Civiale was never to cease, had transferred all his promises of support from me to M. Heurteloup. While those promises were held to the ear, I learned some of the particulars of this patient's case, which led me to believe that it was by no means an unfavourable one. The statement contained in your journal, though it aims at establishing an opposite conclusion, confirms me in this opinion.

Our foreign *confrère* having seen this patient, observed that the case was not likely to do credit to his, or any other operation. He, however, proceeds to examine the bladder. The water injected through the catheter into this organ is forcibly ejected; and notwithstanding the superiority of this instrument to ascertain the size, number, &c. of the calculi, only one small calculus is discovered in a bladder containing many. At the second meeting, (24th July), M. Heurteloup has not yet made up his mind as to this patient's fitness for the operation. Why so? Does the sojourn of a few small stones in the bladder for three or even six months, determine so much local mischief, so much constitutional irritation, as to make the decision of his fitness for operation a matter of doubt? If so, it must be an extraordinary case indeed!

"A three-branched instrument is however introduced, rather for the purpose of shewing the mode of doing it than with the intent of performing an operation." One of the small stones is seized, the instrument is fixed in a vice, and this little stone is drilled and crushed. The great irritability and diminished capacity of the bladder, the result of six months' disease, are dwelt upon at some length, to shew the unfavorable state of this case; and nevertheless, at the first sitting, two injections of tepid water were thrown into the bladder, one of about ten ounces. Ten ounces of water injected into a contracted and irritable bladder!!

This patient underwent three sittings or operations, two explorations, besides repeated introductions of sounds, and a month's treatment. Mr. White shewed me the fragments resulting from this operation. The instrument employed was Dr. Civiale's. I need not say how he would have disposed of such a case.

Let us now proceed to the review of the cases in which it is asserted I have failed. In visiting Bartholomew's hospital on the 1st of August, after being introduced to Mr. Lloyd, he spoke to me of a case, then in the hospital, which he considered unfavorable for lithotomy, and at the same moment proposed to me to see it. I had with me an instrument which I had been shewing to Mr. Earle. The patient, Hannah Stewardson, aged 19, lay in bed, to which she had been confined since her entrance into the hospital; her calculous affection dated from her infancy; and since her tenderest years she had laboured under an incontinence of urine. She was pale, emaciated, and stunted, not appearing to be more developed than a girl of fourteen or fifteen—a mere skeleton, in fact, her sufferings having been for a long time before quite excruciating. To inject the bladder was out of the question. The instrument was therefore introduced without attempting this. A large stone was immediately laid of, and not having the bow to drill it, it was crushed. The instrument was then withdrawn, the operation having lasted *one minute*. Mr. Lloyd, now supposing that the stone was entirely crushed, introduced Mr. Earle's dilator, with a view to remove the fragments by the forceps. After he had succeeded in passing his finger into the bladder, he found a considerable number of fragments beneath the neck, together with a large stone, lying a little to the left. During the six succeeding days she continued to pass those fragments; and the tone of the bladder had been so much improved by the operation that she now, to her great astonishment and satisfaction, began to be able to retain her water. This operation, was performed on the patient's bed, in the presence of Mr. Lloyd, and a vast concourse of the pupils attending the hospital. The patient, not knowing what sort of operation was about to be performed on her, and imagining that I was going to cut her, gave all the resistance in her power to the introduction of the instrument.

On the 7th of August the second operation upon Hannah Stewardson took place. Upon this occasion she objected to having it performed in the presence of so many pupils; and accordingly she was removed to the sister's room, and again, without injecting the bladder, and

only with the quantity of urine which the bladder was now able to retain, the instrument was introduced, a stone was seized, measuring eleven lines, or an English inch in diameter, the drill was turned round twice or thrice with the fingers, and the stone being soft, it was crushed into fragments almost immediately by the pressure of the branches and perforator. Some of the fragments were also seized and crushed. The instrument was now withdrawn, loaded with moist "detritus," and the patient was ordered a hip-bath. From this day forward she retained her water perfectly, and passed such a quantity of fragments in the course of eight or ten days as filled two small pill boxes. This operation was performed in presence of Mr. Lawrence, Dr. Grayson (of New York), Dr. Rawes, Mr. Ferrich, &c. On the 13th she was entirely free from pain, her appetite and freshness of colour returned, her nights were good, and she no longer wetted the bed. On Monday, 17th, she refused to submit to a third sitting, although she had had some pain on Saturday; a fragment she said was coming forward, and her refusal arose from her expectation that it would be soon expelled. Her expectation was realised, for on the same evening she passed a very large-sized fragment. She continued afterwards to improve rapidly, and left the hospital without consenting to submit to an exploration of the bladder. Both the sittings lasted about two minutes. The operation excited great interest, a feeling which will always attach to this case, from its having been the first successful one of lithotrity performed in a public hospital in Great Britain. Hannah Stewardson returned to the workhouse. I visited her yesterday, and found her, to use her own words, in "the best health she has ever had." The subjoined certificate completes the evidence of Hannah Stewardson's case:—

"I, the undersigned, churchwarden of the parish of St. Anne, Blackfriars, city of London, certify that Hannah Stewardson, inmate of the workhouse of the said parish, and lately under treatment for the cure of stone in the bladder at Bartholomew's Hospital, by the new method for grinding and crushing it, has left that hospital, and affirms positively and gratefully, that she owes her cure, which she assures us is quite

perfect, to Mr. Costello; and that being fully satisfied thereof, she refuses to undergo examination by the sound.

(Signed) "JOHN HOWE,
"Churchwarden of the above parish.
"Sept. 19, 1829."

My second case is that of Mr. Stone, of Folkstone. This gentleman is now at the end of his treatment, and although I do not give him as completely cured, I may be able to do so on Tuesday next, when a sitting (which I expect will be a final one) will take place. This patient's bladder contained two small calculi, of the size of peach stones. Two sittings, the first of two minutes, the second of three minutes, have sufficed for the destruction of these calculi. This patient lodges at No. 72, Piccadilly, where such persons as are curious to see the results of these two operations may satisfy themselves. This is the second case: Mr. Alcock may ascertain whether it is, or is not, a failure. Now let me suppose a case: if, after M. Heurteloup's first or second sitting on Mr. Wattie, I came forward and stated that his operation was a failure, by what name would my interference deserve to be qualified? Mr. Alcock, it would appear, is not partial to the success of lithotripsy, unless obtained by M. Heurteloup. He represents my cases as failures. I decline the advantage of retortion—I would rather ask, as the friend of lithotripsy, why there should be any failure by this method? There ought to be none in proper hands, except where, from great and long-continued constitutional and local irritation, or concomitant disease, lithotomy holds out no chance, and then even lithotripsy itself will have its perils.

The profession and the public may now pass judgment on my efforts. The next question is of higher interest to both—I mean the results of Dr. Civiale's practice. Mr. Alcock states, on the authority of a prejudiced commentator, that out of *eighty* patients, only *forty-two* were cured by Dr. Civiale.

M. Civiale, in his note on catarrh of the bladder in aged people, read before the Academy of Sciences in March last, remarks, that in the first year of his practice, two-thirds of the patients who sought relief by his method were refused, from the unfitness of their condition to undergo lithotripsy; a third only of the applicants having been admitted. In the second year, one-half of the applicants,

and one over, obtained their cure by this method. In the third and succeeding years, two-thirds and more of the applicants were received and cured. Thus, when I left him in July, the number of patients who owed their cure to this method amounted to nearly *one hundred and forty*, and M. Civiale had then under operation *seventeen* patients.

Of the patients refused by M. Civiale, two died before they had been even so much as sounded; twenty-one were merely sounded before they were refused by him; ten underwent exploration by the lithotrite; four died from the progress of the disease, or other causes, after their calculi had been seized and attacked once; and of three others, one died of gastritis, one of a neglected retention of urine, with which he had been attacked in the country, where his business obliged him to be for a short time, and the third (a child, nine years old) died, several months after the operation, of a suppuration of both kidneys. Thus, of eighty-two patients whom M. Civiale is represented to have operated on, only forty-three were operated on in point of fact; and that of these forty-three, only one died of gastritis. Will Mr. Alcock answer how lithotripsy could have supplanted the cutting operation, if its results had been so disastrous as he states them to have been? He must learn to appreciate his authority a little better. It is dangerous to allow one's self to be led away by the *concilium ab irato*.

If my friend Dr. Civiale's successes had not been imprudently placed in invidious contrast with those of M. Heurteloup, I should have blushed to make the latter the subject of unkind comment. The indiscretion of his friends forces me to lay aside this reserve. M. Heurteloup has never favoured science with the details of his *forty-three cases*. In 1827, he merely affirmed that *he had introduced* his instruments into the bladders of *eleven* patients. About the month of March of the present year (I may misstate the precise date), he informed the academy, still without any details, that he had operated in *twenty-three cases*. On the eve of his departure from Paris, to come to London, this number, he asserted to different persons, had increased from twenty-three to twenty-nine, or thirty; and one which he has had in this country makes *forty-three!!!* To convince the world

of his having operated in forty-three cases, I say, let us have the details. M. Civiale has published his without reserve. But admitting that M. Heurteloup has operated in forty-three cases, and lost but one, it will be for Mr. Alcock to answer how MM. Desaugiers (whom M. Heurteloup treated for thirteen months) and Riviere came by their death? Of course it is superfluous to say, I expect, that the names of MM. Courtois, Neurohr, Delamontague, Rochet, &c. are not to figure in his catalogue.

Your correspondent will have it that this question is decided in Paris, by the Academy of Sciences, in favour of M. Heurteloup, and not in favour of M. Civiale. If this be so, why is M. Heurteloup here? He further supposes that I am ignorant of the document which proves this decision (viz. the Programme of prizes). I am so little ignorant of this document, that I was the first to publish it in England a month ago. I prefaced this document by a statement of the fact, that the Academy, in 1824, heard read, and adopted, the report of its commissaries, the Barons Chaussier and Percy, in which the claims to the discovery of lithotrity are decided in favour of M. Civiale; and in which his instruments and method of operating are described. With this preface, if Mr. Alcock will take the trouble of reperusing the Programme, he will readily perceive that the Academy, in 1826, are no longer occupied in considering the claims to the invention, but in awarding prizes for its successful application; and that, amongst the candidates, M. Civiale figures for 6000 francs, while the others figure but for 2000 francs each. How comes it to pass, if Mr. Alcock is acquainted with those Programmes of prizes, that he overlooks the prize of 10,000 francs awarded to M. Civiale in 1827?

I shall close this discussion between MM. Civiale and Heurteloup by a few observations. M. Civiale's claims to the invention are admitted by the Academy, who bestow on him, at different times, large sums of money. The government honours him with the title of a Knight of the Legion of Honor. One of the most eminent surgeons in France, the Baron Dubois, affected with stone, only last March, overlooks his feelings of private friendship for M. Leroy, and receives his cure from M. Civiale. The

Administration of Hospitals gives him a ward for his poor calculous patients in the Hôpital Necker. In the space of five years and a half, nearly *one hundred and forty patients* are cured by him, while those who arrive in Paris to undergo this operation, put themselves, almost without exception, under his care; and, finally, he is honoured by foreign potentates with medals and other titles of merit, as well as by the friendship and correspondence of such men as Soemmerring, Scarpa, &c. &c. Now, suppose these facts to have no other support than my assertion, the following questions will serve as a test of their correctness:—Is the French nation so besotted? Is medical science fallen so low? Is the government which dispenses honours so undiscerning? Is Professor Dubois so reckless of his personal safety? Are crowned heads such dupes? Are learned men so weak? Is the Administration of Hospitals so indifferent to the lives of the poor, as to suffer a man, who we are told succeeds in *forty cases* out of *forty-three*, to deprive his country of his boasted services, and not only retain but prefer M. Civiale, who is represented to have failed in forty out of eighty-two? This would be repugnant to common sense.

M. Leroy, according to your correspondent, is the inventor of lithotrity; I have written an historical article on lithotrity, which will appear in the London Medical and Physical Journal for October, in which positive proof is produced that such is not the fact. Mr. Alcock states that M. Civiale shewed to M. Marjolin an instrument with a pouch for enclosing a stone to be dissolved by reagents, and that M. Civiale never shewed him any other instrument. This pouch instrument was one of the three instruments proposed to the commission of the Faculty of Medicine in 1818. It is unfortunate for M. Leroy's assertion that M. Civiale never had those instruments executed, and consequently, he could not have shewn them to M. Marjolin!

M. Leroy admits and publishes that he had read M. Civiale's memoir at Baron Percy's house, in which he acknowledges that he found the description and drawing of an instrument, with elastic branches and perforator, for seizing and crushing calculi in the bladder. This memoir dates from 1818.

M. Leroy's first instrument, published in 1822, consisted of watch-springs for seizing and fixing the stone. This mechanism not answering his purpose, he copies the forceps of Franco's relation, or M. Civiale's memoir, and upon this he sets up for being the inventor, although he admits that M. Civiale's memoir speaks of such an instrument in 1818.

M. Civiale's first instruments had no provision for preventing the water injected into the bladder from escaping during the operation: he remedies this defect, and M. Leroy copies him, yet, forsooth! he is the inventor!

When M. Civiale's operations begin to be known, in March 1824, M. Leroy endeavours to be considered a joint discoverer with M. Civiale, and accordingly proposes to him by letter this community of rights. M. Civiale refuses. In the month of April 1824, M. Leroy makes the first application of his instrument, in which he fails.

He at length insinuates that the Commissaries of the Academy of Sciences have substituted, or connived at a substitution, of *pieces*. The Baron Percy's letter on this occasion, which I shall publish, is a model of benevolent and mild reproof. The following is an extract:—"I still have in my possession one of the little watch-springs for which you have since substituted the forceps of Franco's relation: you let it drop in my room, when you came to shew me your instruments, with which most assuredly you could not have performed one of those brilliant operations of which M. Civiale made us witnesses."

Now, if M. Leroy published in 1822 an instrument with watch-springs to seize the stone, and that he afterwards changed those watch-springs for elastic branches, how does this make him the inventor of lithotrity? M. Civiale's memoir preceded him by five years, and Franco anticipated him by more than a century. M. Leroy, in pretending to so much, does he not put in jeopardy the very idea of the independence of his labours, as connected with his predecessors? The world may give him the merit of having pursued this problem upon his own resources;—no more. His efforts to raise himself above M. Civiale must be fruitless.

Your correspondent supposes that M. Civiale and myself know nothing of M. Heurteloup's instruments; what

proof can he have of this? In a matter of which he must know so little he ought to have been more discreet. M. Civiale and myself have had those instruments several times in our possession; and our opinions of them are not, as Mr. Alcock gratuitously asserts, from hearsay. If Mr. Alcock has any fancy for this instrument, I shall put him in a way to procure it.

I must terminate this long letter. Mr. Alcock insinuates that petty jealousy is the cause of my entering the lists, while he does himself the credit of becoming an advocate on the exalted ground of science. Whatever the persons who have devoted years to this subject may be able to do for science, Mr. Alcock can have no pretensions in this respect. He is simply M. Heurteloup's translator. Whether he has conducted this discussion with calmness, good temper, and dignity, the world will judge; whether he has done me an injustice, he now may be enabled to determine. He is a member of a profession which honour and fair dealing characterize, and could not have been actuated by petty jealousy. My friend—my master, was slandered and abused: any hesitation on my part to defend him would have shown a bad cause on the one hand, and my ingratitude on the other.

I have the honour to be, Sir,

Your very obedient servant,

W. B. COSTELLO.

108, Jermyn-Street, Sept. 19th, 1829.

MEDICAL GAZETTE.

Saturday, Sept. 26, 1829.

"Licet omnibus, licet etiam mihi, dignitatem *Artis Medicæ* tueri; potestas modo veniendi in publicum sit, dicendi periculum non recuso."—CICERO.

CONCLUSION OF THE VOLUME.

In compliance with the wishes of many of our readers, we conclude a volume with the present number, for the purpose of beginning a new one with what is regarded as the commencement of the medical season. The winding up of various subjects previously commenced, and the other arrangements connected with our plan, have obliged us to post-

pone the papers of several correspondents, who, we trust, will accept of this apology for the delay. The same circumstance has also led to the omission of most of our hospital reports.

We are gratified in being able to state that we have every prospect of rendering the Medical Gazette more worthy of the patronage it has received, by drawing from additional sources which have been opened to us, and by the progressively increasing number and value of our communications.

HOSPITAL REPORTS.

HOTEL DIEU.

Necrosis of half the Lower Jaw—Extraction of the sequestrum by M. Dupuytren.

THE phenomenon of an incarcerated sequestrum does not belong exclusively to the long bones. A woman, 30 years of age, pale, fat, and eminently *lymphatic*, had experienced during the last two years slight and transient pains in the left side of the jaw, when about eight months ago these increased so much as to disturb her sleep. The teeth, which till then had been white, assumed a greyish colour, and the breath became fetid. After a month of acute suffering, a fistula took place at the symphysis, within the base of the jaw; others soon shewed themselves at various points nearer the angle, but always within the lower margin of the bone, and on the left side. One only formed to the right, about half an inch from the symphysis. The suppuration also burst into the interior of the mouth. The patient asserted that the pus only oozed from the gums; but the sequel proved that there was a true fistula internally. When she used a gargle, some of it always escaped by one of the four fistulæ. It was six months since the mastication had become painful and almost impossible, and since the molares of the affected side became loose. At this time also the soft parts which cover the anterior maxillary foramen almost entirely lost their sensibility, which could only have arisen from the destruction of the nerve. Tonic remedies were employed without avail: the pains con-

tinued to increase in severity, and the suppuration to augment in quantity. The disease was recognised by M. Dubois, but he having found the sequestrum to be immoveable, advised the woman "to have patience."

She came to the Hotel Dieu the beginning of August, at which time it was difficult to recognise the dimensions of the new bone amid the swelling of the soft parts; but it was ascertained to be very solid, and to inclose the old bone in its cavity. A probe introduced at one of the fistulæ gave the idea of a moveable body, and even caused a noise, which was audible at a certain distance.

On the 17th of August the following operation was performed:—The patient's head being fixed by an assistant, M. Dupuytren laid the two posterior fistulæ into one by an incision about an inch long; then cutting deeper, he opened, at its lower part, the bony cavity which contained the sequestrum. By means of the common pincers he removed, not without some effort, a plate of bone, two inches long and one in breadth, and a line and a half thick. The fore-finger introduced to the bottom of the wound discovered another portion of bone, moveable and denuded, situated at the back part. The pincers were again applied, and extracted a triangular fragment, which proved to be the angle of the jaw. The finger of the operator traversed freely every part of the cavity, and felt the naked roots of the teeth—those of the molares were loose, and M. Dupuytren debated with himself, whether, under such circumstances, they could live. The transplanting of teeth has so frequently succeeded, that it appears probable that in this case they will not perish, but recover their solidity by an approximation of the bone, from which they are now some lines distant. A *meche* was introduced into the wound, and the dressing completed with dry charpie.

From this time the matter only passed by the wound—the mouth was no longer infested with it. A large opening existed between the cavity of the mouth and that of the new bone, and between this last and the exterior. This communication existed before; but the absence of the sequestrum now rendered it more pervious, so that the gargle readily escaped by the wound. After a few days the wound was not filled with the charpie, and it began to contract. The bony

pouch contracted every day, if we may judge from the teeth becoming fixed, and from the quantity of fluid which passed from within outwards diminishing. The pain left her entirely.

Sept. 4.—All the molares are now as fast as those of the opposite side.

6th.—M. Dupuytren has discovered, by means of a probe, that the other half of the jaw is also dead. He intends to operate on it when the sequestrum becomes mobile.—*Lancette Française*.

Amputation of the Jaw.

The patient who suffered amputation of the jaw (see our present volume, p. 476), was discharged from the hospital entirely cured the second week in Sept., the healing of the wound having proceeded with great rapidity.

Extirpation of the Uterus.

The patient who had the uterus extirpated (see page 346 of the present volume) was examined on the 27th of August by MM. Dubois, Dupuytren, Dereux, Desormeaux, Marjolin, Roux, and Richerand, by whom it was unanimously agreed that the recovery was complete. This result appears surprising, when it is remembered that the operation was only performed on the 26th of July, so that not more than a month was required to effect a radical cure, although several interruptions took place during the cicatrization.

Extraction of a Calculus from the Urethra by means of M. Leroy's pincers.

A man, aged 51, an old soldier, had a gonorrhœa twenty years ago, for which he did not make use of an injection. Ten years passed without any difficulty in making water, but he was then seized with pains in the loins, and soon after the voiding of his urine became difficult, and required great effort. This difficulty has lasted ever since. The pains in the loins have returned at short intervals, but have never been attended by the passage of gravel, although the water deposited a considerable quantity of mucus.

On entering the Hotel Dieu he was sounded by M. Breschet, who discovered a calculus in the urethra, about five inches from the orifice. M. Breschet made various attempts to extract it with pincers of Hales, but these only pushed the stone back, without seizing it. M. Leroy had a small pincers made, spoon-

pointed, and next day, after having introduced them as far as the calculus, M. Breschet placed his hand below the scrotum, and pressing on the urethra, prevented the stone from escaping; the instrument was then opened by its peculiar mechanism, and the foreign body enclosed in its grasp, so that it was easily withdrawn. It was the size of a large pea. Some drops of blood followed its extraction, but no other inconvenience. A stricture was found at the point of the urethra where the calculus had stuck, and this was cured in the course of a month, when the patient left the hospital.—*Ibid*.

NEW REGULATIONS OF THE ROYAL COLLEGE OF SURGEONS, LONDON.

It is understood that new regulations for the guidance of candidates for a surgical diploma, are about to be issued. It is to be regretted that these have been so long delayed; and as the pupils now arriving in town are naturally anxious to know in what manner they will render it necessary for them to modify their arrangements, we may state that we have reason to believe that some of the changes repeatedly recommended in this journal will be made.

1. That to the list of schools already recognized, will be added those in the provincial towns where there are large hospitals, and where satisfactory opportunities of teaching are afforded.

2. Probably, however, the student will still be obliged to attend to his professional studies, during at least one winter season, in one of the capitals of the three kingdoms,—viz. London, Dublin, or Edinburgh.

3. We conjecture that the hospital attendance will be modified so as to admit one year at a provincial hospital as equal to six months in London, &c.: the other six months being still required to have been attended in one of the metropolitan hospitals.

ROYAL COLLEGE OF SURGEONS OF EDINBURGH.

Regulations to be observed by Candidates, previously to their being taken upon trial for obtaining Diplomas from the Royal College of Surgeons of Edinburgh.

Surgeons' Hall,
Edinburgh, July 1829.

Schools of Medicine, Courses of Lectures, Qualification of Teachers, &c.

Every candidate for a surgical diploma must have followed his studies in a univer-

sity ; or established school of medicine ; or in a provincial school specially recognised by the College, and which shall conform to such laws and regulations as have been, or may hereafter be enacted.

Under the title established school of medicine, are comprehended all places in this country where diplomas in surgery are granted, and such foreign schools as are acknowledged by the constituted authorities of the countries where they exist.

No provincial school shall be recognised where there is not a general hospital, containing at least eighty beds, at which regular medical and surgical attendance is given, and where there are not established courses of lectures on anatomy and chemistry.

No course of lectures given at a provincial school shall be recognised, unless it be of the same extent and duration as the course required on the same subject in Edinburgh.

The extent and period of study allowed to be gone through at a provincial school, will be regulated by the means and facility of study which the College receive evidence of its affording ; but, in all cases, at least two winter, or one winter and two summer sessions of the course of study required for a diploma, must be passed at a university, or at one of the established schools of medicine.

In Edinburgh, the Lectures to be attended as part of the surgical *curriculum* shall be delivered by professors in the university, or fellows of the Royal Colleges of Physicians or Surgeons there ; and elsewhere, by professors of universities, or by fellows of the Royal College of Physicians of Edinburgh, and fellows or licentiates of the Royal Colleges of Physicians of London and Dublin, by fellows of the Royal Colleges of Surgeons of Edinburgh, London, and Dublin, and of the Faculty of Physicians and Surgeons of Glasgow ; and by persons holding a medical degree or surgical diploma, whose courses of lectures have been recognised by the College on special application.

No tickets of a professor or lecturer shall be recognised who teaches more than two of the branches required by the College ; but anatomy, with practical anatomy ; and chemistry, with practical chemistry, shall each, in reference to this regulation, be considered as one branch.

Course of Study.

Every candidate for the diploma of the Royal College, either previously to, or during his medical education, must have received regular instructions in the elements of mathematics ; and must have attended a course of mechanical philosophy of at least three months' duration, delivered by a professor of that branch in a university, a lecturer in a public institution, or a teacher specially recognised by the College.

The candidate must have attended the fol-

lowing separate and distinct courses of lectures during a period of at least four winter sessions, or three winter and three summer sessions, provided that in each summer session he shall have attended one or more of the courses prescribed or recommended by the College, exclusive of hospital attendance, and also provided that the summer courses of lectures shall not commence till after the conclusion of the winter courses.

	Courses.	Duration at least Months.
Practical Anatomy	{ 1 ... 6 or 2, 3 each.	
Anatomy	2 ... 6 each.	
Chemistry	1 ... 6	
Practical Chemistry	1 ... 3	
The number of pupils in each class being limited to 25.		

Materia Medica & Pharmacy	1 ... 6	
Institutions of Medicine, or Physiology	{ 1 ... 6	
Practice of Medicine	1 ... 6	
Clinical Medicine	{ 1 ... 6 or 2, 3 each.	

During the period of attendance at the hospital where they are delivered.

Principles & Practice of Surgery	2 ... 6	
Or { Do. and Military Surgery* ...	{ 1 ... 6 1 ... 6	
Clinical Surgery	{ 1 ... 6 or 2, 3 each.	

During the period of attendance at the hospital where they are delivered.

Midwifery, and the Diseases of Women and Children	{ 1 ... 3	
------------------------------------------------------	-----------	--

With the exception of the courses of clinical medicine, clinical surgery, and military surgery, in which lectures are not delivered daily, the six months' courses, delivered in Edinburgh by fellows of the college, or others, are understood to consist of five lectures per week for a period of not less than five months.

Two London courses of three months each, on any of the above subjects, shall be taken as an equivalent to one six months' course.

The candidate must also have attended for eighteen months a public general hospital, containing at least eighty beds ; or for twelve months such a public general hospital, and six months a medical or surgical hospital, or dispensary, recognised by the college on special application.

* The course of military surgery must be delivered by a professor of that branch in a university ; or by a lecturer, who, in addition to the other required qualifications, has served in the medical department of the Army or Navy ; and the course of lectures must be of at least six months' duration, lectures being delivered at least thrice per week.

The candidate shall be required, in addition to the tickets or proof of entry to the different classes, to produce certificates of his having attended these classes, from the respective professors or lecturers; and in the case of practical anatomy, the certificate must express that the candidate has been actually engaged in the dissection of the human body, under the personal superintendence of the professor or teacher, during the course of his attendance.

The candidate, at the commencement of his examination, will be required to translate into English some portion of a Latin author.

The following order of study is recommended as a guide to the student, though not absolutely enjoined:—

First year—Anatomy, Chemistry, Mechanical Philosophy (if not previously attended).

Second year—Anatomy; Practical Anatomy; Institutions of Medicine, or Physiology; Surgery; Materia Medica and Pharmacy, either in this or the third year.

Third year—Practice of Physic; Clinical Surgery; Practical Chemistry; Hospital.

Fourth year—Surgery, or Military Surgery; Midwifery, and Diseases of Women and Children; Clinical Medicine; Hospital.

Besides the courses of lectures on the different branches of medicine required by the College, they strongly recommend to students to avail themselves of the opportunities they may possess of attending lectures on Medical Jurisprudence, Botany, Natural History, Comparative Anatomy, and Pathological Anatomy.

The duration and course of study to be required of apprentices, whose indentures commenced before 1st January 1823, are still regulated by the laws in force previously to that date. The course of study of apprentices and others, who entered upon their indentures or their medical studies generally after that date, and before 1st August 1829, will be determined by the rules in force within this period. The present regulations as to endurance and course of study shall take effect as to all who enter upon their medical education after the last mentioned date.

The regulations as to lecturers, teachers, &c. &c. are to take effect immediately.

Examination.

The days of examination are the first and third Tuesdays of every month.

No Candidate will be admitted to examination before the termination of his last year's course of study.

Applications for examination must be made to the President of the Royal College, two days previously to the day of examination.

Every candidate for a diploma, on applying to the President for examination, is required to present his tickets and certificates, and also a written statement, containing his

name, age, and country, and a list of all the classes, hospitals, and dispensaries, attended during each session of his study.

If the candidate be an apprentice for three years, he must also produce his discharged indenture. If for five years, he may apply at the end of four without losing any privilege, provided he has written permission from his master, and that the date of his indenture, and whether it be for the freedom or not, is certified at the bottom of the written permission by the Secretary. All apprentices must also state the names of their masters, the dates of their indentures, and length of time for which they were bound.

Printed forms will be furnished by the officer of the College to each applicant, which he will fill up and sign before applying to the President, who will give him a letter authorizing the Examinators to take him on trial.

The fees payable to the funds of the College must be lodged before examination in the hands of the Treasurer, who will certify this upon the President's letter, after inspecting and being satisfied with the certificates.

The fees will be returned to unsuccessful candidates, whose names will be concealed.

Unsuccessful candidates will be remitted to their studies for a period, not less than three months, to be determined by the judgment of the Examinators.

The President, if he judge it proper, can order a meeting on any day, at the request of a candidate; but, in that case, the candidate must pay two guineas in addition to the customary fees; and this money is not returned to him in the event of his being rejected.

Fees payable to the Funds of the Royal College.

For a diploma, the sum of six pounds sterling.

Apprentices of Fellows of the Royal College bound for the freedom, pay no fees to its funds for diplomas or certificates; their other apprentices pay one pound eleven shillings and sixpence.

Candidates for the certificate of qualification to act as assistant-surgeon in the navy, who have not paid for any previous qualification, the sum of four guineas.

Assistant-surgeons who have already obtained certificates from the College, applying for certificates for the qualification of full surgeon, three guineas.

Assistant-surgeons in the navy, having previously obtained the diploma of the College, when candidates for the situation of full surgeon, the sum of two guineas.

A surgeon in the navy, having obtained certificates from the College, may receive a diploma on paying the usual fees to the Secretary and Officer.

An assistant-surgeon in the navy, having obtained his certificate from the College, may

receive a diploma on paying the difference of expense betwixt that of the certificate and of the diploma, and the usual fees to the Secretary and Officer.

Fees payable to the Secretary.

For a diploma to a student or apprentice, ten shillings and sixpence sterling; besides nine shillings and sixpence as the expense of vellum, &c. for the diploma, and box wherein it is contained.

For a certificate to surgeon or assistant-surgeon in the royal navy, ten shillings and sixpence.

Fees payable to the Officer.

For a diploma or certificate, three shillings; or, if he takes charge of getting the diploma or certificate signed by all the Examinators, five shillings sterling.

By authority of the Royal College,
(Signed) Wm. Wood, President.

LETTER FROM MR. POPE.

To the Editor of the London Medical Gazette.

SIR,

I AM unwilling to believe that any of your correspondents would *intentionally* communicate what is incorrect, or state any thing with a view to mislead either the profession or the public; yet a misrepresentation, tending to do so, having been published in the Medical Gazette, I am induced to address you upon the subject, from a conviction that the respectability of the medium greatly enhances the importance of whatever is promulgated.

Every body must be aware of the responsibility which attaches to those who *disperse* as well as those who *prescribe* important remedies; and it may therefore be desirable to know *where*, and of *whom*, particular medicines may be obtained. In the instance to which I now beg to refer, respecting "Tr. Semin Colchici," at page 400 of the Medical Gazette of the 29th ult. there is much of quackery and duplicity in the nominations made by Mr. Evans at the close of the paper on the efficacy of this *long known* remedy.

He writes, "the Tr. Semin. Colchici is kept by Pope, in Oxford Street; Lowe and Johnson, 30, Bishopsgate Street; and Harvey, 63, Great Surrey Street, Blackfriars." Thus it would seem that these are the *only* places where the remedy can be had; but, let it be observed further, that the *two* latter are specially notified by the *numbers* of the houses and particular streets; whilst the former is in *Oxford Street*.

This constitutes the misrepresentation now complained of, and I trust to your liberality and love of truth to publish this letter, because it is but right that the profession and the public should be undeceived by a recognition of the *responsible head* of every depôt

for important remedies, rather than that a mistaken confidence should be perpetuated under a *false* name and dishonest pretensions.

Suffice it, Sir, to add, that no chemist and druggist, or pharmaceutic dispenser, of the name of *Pope*, is now living in *Oxford Street*. The late Mr. John Pope, (my brother), who unfortunately fell a sacrifice to his indefatigable zeal for the improvement of medical science, died *five* years ago; and the business established by him has passed, since the year 1824, into the hands of *two* or more successors.

Who the responsible proprietors of the shop, No. 96, *Oxford Street*, superscribed "Pope and Co. from Savory, Moore, and Co. New Bond Street," have been since the above period *has never appeared*. Certain it is, that no person of the name of *Pope* is connected with the establishment. The present proprietor never had permission to use the name of *Pope*; was never in the house of Savory, Moore, and Co. of New Bond Street and Regent Street; nor has *he* ever obtained an appointment to H.R.H. the Duchess of Gloster, although he continues to use this distinction five years after the decease of the late John Pope, to whom *alone* such appointment was condescendingly granted.

I remain, Sir,

Your obedient servant,
J. H. POPE.

3, Manchester Square,
13th Sept. 1829.

LITERARY INTELLIGENCE.

Dr. Arnott's Elements of Physics, or Natural Philosophy, will be completed by the publication of the Second Volume, of which the first half, comprehending the subjects of Heat and Light, with a copious Account of the important and the beautiful Phenomena which range under these heads, is to appear early in October. It will be accompanied by a Fourth Edition of Vol. I. in which the true nature of the common defect in Speech, called Stuttering, or Stammering, is for the first time completely exposed, and, as a fruit of the Discovery, a Key, of very easy application, is given, for effectually setting free the imprisoned voice.

A Manual of Midwifery, or a Summary of the Science and Practice of Obstetric Medicine. By Michael Ryan, M. D. M. R. C. S. &c. Second Edition.

ERRATA.

In the leading article of the preceding No. page 501, for "morality and public spirit has," read "morality and public spirit have."

Page 502, second column and first line, for "interest," read "interests."

W. WILSON, Printer, 57, Skinner-Street, London.

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